European Commission

Research Report

Study on the Economic Impact of Sport through Sport Satellite Accounts

April 2018

SortsEconAustria

Institute of Sports Economics

Sheffield Hallam University

Sport Industry Research Centre

Sport

Disclaimer

"The information and views set out in this study are those of the author(s) and do not necessarily reflect the official opinion of the European Commission. The European Commission does not guarantee the accuracy of the data included in this study. Neither the European Commission nor any person acting on the European Commission's behalf may be held responsible for the use which may be made of the information contained therein."

Europe Direct is a service to help you find answers to your questions about the European Union.

Freephone number (*):

00 800 6 7 8 9 10 11

(*) The information given is free, as are most calls (though some operators, phone boxes or hotels may charge you).

More information on the European Union is available on the Internet (http://europa.eu).

Luxembourg: Publications Office of the European Union, 2018

ISBN: 978-92-79-76925-2
doi: 10.2766/156532

© European Union, 2018
Reproduction is authorised provided the source is acknowledged.

Table of contents

Table of figures

Abbreviations

GDP	Gross Domestic Product
GVA	Gross Value Added
IOT	Input-Output Table
IOT:S	Input-Output Table for Sport (pl.: IOTs:S)
MR-IOT	Multiregional Input-Output Table
MR-IOT:S	Multiregional Input-Output Table for Sport (pl.: MR-IOTs:S)
MS	Member State of the European Union (pl.: MSs)
SA	Satellite Account
SSA	Sport Satellite Account (pl.: SSAs)

Executive Summary

Article 165 of the Treaty on the Functioning of the European Union explains that "The Union shall contribute to the promotion of European sporting issues".[1] As a response, in 2006, the European Commission set up the EU Working Group "Sport and Economics" which developed the Vilnius definition for sport to identify economic activities in goods and services associated with sport. Based on that, national Sport Satellite Accounts (SSAs) were calculated by Austria, Belgium, Cyprus, Poland, and the United Kingdom. They formed the basis for an EU-wide multiregional Input-output tables for sport (MR-IOT:S) which was published in 2012 and based on 2005 data.[2]

The current research, using 2012 data, updates the original study on the basis of four premises: Croatia joining the EU; the long past base year; the economic crisis which may have caused systematic changes in the results; and an update of the Vilnius definition, which too was part of the work undertaken during this project. The availability of fully-fledged national SSAs from Austria, Belgium, Cyprus, Germany, Lithuania, Luxembourg (closely approximated, but still preliminary), the Netherlands, Portugal, Poland, and the United Kingdom provided a much wider firm database compared to the one available for the first model.

It was found that in 2012, sport related Gross Domestic Product (GDP) was 279.7 bn Euro or 2.12% of total GDP within the EU. In addition, 5.67 m employees[3] could be attributed to sport, a share of 2.72%. Stated otherwise, around every 47th Euro and every 37th employee in the EU are directly sport-related. These numbers indicate that sport is an employment-intensive economic activity, therefore generating a greater sport share in employment than in GDP. In fact, an increase of GDP by 1% goes hand in hand with an additional 1.35% of employment. This is an important insight, as it underlines the substantial role sport plays in countering unemployment. This key-result was already found in the previous study and is further supported by the new data.

[1] http://www.lisbon-treaty.org/wcm/the-lisbon-treaty/treaty-on-the-functioning-of-the-european-union-and-comments/part-3-union-policies-and-internal-actions/title-xii-education-vocational-training-youth-and-sport/453-article-165.html

[2] See SpEA, SIRC, Statistical Service of Republic of Cyprus, Meerwaarde Sport en Economie, FESI, Ministry of Sport and Tourism of the Republic of Poland (2012)

[3] Throughout the report by 'employees' we mean both employees and self-employed in total.

Table 1: Main sport-related indicators of the EU-wide model

Member State	Sport-related GDP in m Euros	Share of sport-related GDP	Sport-related employment in heads	Share of sport-related employment
European Union	279,697	2.12%	5,666,195	2.72%
AT – Austria	13,066	4.12%	226,129	5.63%
BE – Belgium	4,494	1.16%	71,440	1.59%
BG – Bulgaria	338	0.80%	44,756	1.55%
CY – Cyprus	361	1.85%	7,813	2.08%
CZ – Czech Republic	2,055	1.27%	84,803	1.76%
DE – Germany	104,707	3.90%	1,761,369	4.60%
DK – Denmark	3,973	1.56%	64,082	2.45%
EE – Estonia	159	0.88%	13,656	2.31%
EL – Greece	1,784	0.93%	47,486	1.31%
ES – Spain	14,984	1.44%	261,839	1.50%
FI – Finland	3,264	1.63%	50,634	2.09%
FR – France	39,923	1.91%	582,709	2.29%
HR – Croatia	676	1.54%	27,908	1.83%
HU – Hungary	1,252	1.26%	75,771	2.00%
IE – Ireland	1,804	1.03%	30,008	1.68%
IT – Italy	21,217	1.32%	389,120	1.76%
LT – Lithuania	283	0.85%	20,043	1.62%
LU – Luxembourg	630	1.43%	4,336	1.89%
LV – Latvia	142	0.64%	12,611	1.48%
MT – Malta	129	1.81%	3,306	1.98%
NL – The Netherlands	7,973	1.24%	150,687	2.04%
PL – Poland	8,952	2.30%	332,939	2.17%
PT – Portugal	1,879	1.12%	59,330	1.39%
RO – Romania	1,389	1.04%	100,279	1.22%
SE – Sweden	5,949	1.41%	109,191	2.43%
SI – Slovenia	609	1.69%	21,916	2.43%
SK – Slovakia	956	1.31%	47,095	2.03%
UK – United Kingdom	36,750	2.18%[4]	1,064,939	3.75%

Source: Own calculations

The largest sport-related sectors are education (51.2 bn Euros, nearly 1,111,000 employees), sport services[5] (42.1 bn Euros, 749,000 employees), public administration (32.2 bn Euros, 503,000 employees), accommodation and restaurant services (23.2 bn Euros, nearly 586,000 employees), and retail (19.9 bn Euros, nearly 587,000 employees). Just these five sectors add up to 1.29% of the EU's GDP and 1.70% of its employment.

[4] For consistency with the SSA of the United Kingdom, the overall GDP was taken from the national IOT.

[5] This is the only specifically sport-related sector in the System of National Accounts. However, even this sector is aggregated with amusement and recreational activities and thus has to be divided into its sport-related and non-sport parts.

Apart from these two indicators, the importance of an economic sector is enhanced through its connections to other parts of the economy via its supply network. The ratio of total activity (including the supply network) to direct activity is called “multiplier”. The highest multiplier of 2.55 is attributed to the production of sport-related food and beverages. Thus, if one million Euros of sport-related food and beverages are produced in the EU, output worth another 1.55 million Euros has to be generated in order to fulfil the food sector’s need for intermediate goods and services. The second highest is for motor vehicles (2.50), and the third for repair- and installation services (2.32).

A further analysis of multipliers reveals those sectors which send out disproportionally high stimuli to the rest of the economy and can thus be considered key-sectors. On the EU-wide level, construction is the most important sport-related sector since, on average, for each million Euros of demand from other companies, 1.24 million Euros of economic stimuli are distributed within the rest of the EU-economy. This is followed by food and beverages (factor of 1.20), travel agencies (factor of 1.17), agriculture (factor of 1.10), and sporting services (factor of 1.10).

Comparing results for 2005 and 2012 is not perfectly possible. The Vilnius definition has changed, although in only a rather mild way; electric bicycles, as an example, are now part of the definition. The statistical categorisation of goods and services, CPA, has been altered meanwhile too. However, this affects the distribution of economic effects among sectors and leaves the total amount unchanged. The biggest difference between the two studies is that the former one was conducted in terms of GVA, whilst the current one uses GDP. Still, there is a gap between the two reports (1.76% sport-related GVA in 2005 and 2.12% sport-related GDP in 2012) which is too large to be attributed to these different measures. In addition, employment, which uses the same definition in both reports, has increased from 2.12% to 2.72%. Nevertheless, concluding that sport, overall, has become more important in economic terms is not possible, as practically all the increase can be attributed to four EU Member States (MSs): Germany, Poland, Sweden, and France. For all other MSs, values close to those of 2005 were found. Finally, it is worth pointing out that data availability for some MSs is improving. This allows the identification of additional sport-related economic activity – a desirable development, but it also leads to systematically increasing values over time.

Some of the main data sources were tables populated by national experts. They included data on Gross Value Added, production value, employment, private expenditure, public expenditure, gross capital formation, and foreign trade of sport-related goods and services. In addition, UN-comtrade and OECD data was used to identify the origins of imports and the destinations of exports and to fill gaps in the data collector sheets. It was, once again, found that data on sport-related services are much less available than on sport-related goods. Different categorisation schemes proved to be an issue too.

Technical support was given to Belgium's experts and institutions in order to create their national SSA. Personal meetings were held with representatives of the Administration Générale du Sport, the General Statistics Department in the National Bank of Belgium, and Statistics Belgium. The Sport Administration of the Federation Wallonia-Brussels coordinated the project and facilitated intermediation.

1 Introduction

This study is the second Pan-European study of the economic value of sport. It assesses the macroeconomic importance of sport in the EU-28 for the year 2012 (the latest year for which a complete dataset of National Accounts could be found). It focuses on sport-related employment and growth potential (in terms of GDP), based on an agreed definition of sport across the EU. The current study follows other European Commission-funded research on the Sport Satellite Accounts (SSAs) in the EU[6], including a mapping exercise on data availability, a harmonisation of the existing methodological manuals, and recommendations for developing national and EU-wide SSAs based on the Vilnius definition. A difference between this and the previous Pan-European Study (SpEA, SIRC et al. (2012)) is the use of GDP, rather than GVA, as the basic indicator of sport related output.

The Vilnius definition of sport used here provides a thorough account of the sport industry, across all spheres of economic activity. Answering questions such as what activities are considered part of the sport economy, or what are the difficulties associated with measuring these activities across the EU, allows governments to fine tune their policies. Other questions to be considered include:

- What is the economic importance of sport in terms of GDP?
- What is the economic importance of sport in terms of employment?
- What are the multiplier effects associated with sport economic activities?
- What similarities and differences can be observed among MSs for these variables and how can these be explained?
- Where are the growth potentials?

The policy context of the present study begins with the Article 165 of the Treaty on the Functioning of the EU (TFEU), according to which EU should promote European sporting issues and develop the European dimension in sport. In the context of the EU cooperation in sport, the European Commission has supported the development of a knowledge base for sport, including reliable information and comparable data. The Commission has established both a tradition and a commitment to develop national SSAs across the EU (White Paper on Sport[7], 2007; Communication on sport[8], 2011). The informal EU Working Group "Sport & Economics", chaired by the Commission,

[6] http://bookshop.europa.eu/en/study-on-national-sport-satellite-accounts-ssas-in-the-eu-pbNC0416012/?CatalogCategoryID=CdcKABstHUgAAAEjBJEY4e5L

[7] http://eur-lex.europa.eu/legal-content/EN/TXT/?qid=1389190214279&uri=CELEX:52007DC0391

[8] https://publications.europa.eu/en/publication-detail/-/publication/db29f162-d754-49bc-b07c-786ded813f71

was set up in 2006. It developed a harmonised statistical definition of sport (the above mentioned "Vilnius definition of sport") and a common methodology to measure the economic impact of sport. The 2012 Council Conclusions on strengthening the evidence base for sport[9] constituted an important step at the political level inviting the Commission to consider funding to support national efforts to develop SSAs. The work on SSAs continued in the Expert Group on the Economic Dimension (XG ECO) set up by the second EU Work Plan for Sport (2014-2017)[10].

So far, based on the Vilnius definition, nine EU MSs (Austria, Belgium, Cyprus, Germany, Lithuania, the Netherlands, Portugal, Poland and the United Kingdom)[11] have national SSAs, while Luxembourg is finalising its own Account and Croatia is about to start. Finally, the XG ECO and the 'Study on national SSAs in the EU' both recommended updating the EU-wide Multiregional Input-Output Table for Sport (MR-IOT:S) as the data used from 2005 was: pre-crisis; based on an outdated CPA 2002 categorisation; and did not include Croatia. Furthermore, in the interim, the fact that more MSs have developed national SSAs might reasonably be expected to further improve the quality of the study outcomes. The above mentioned recommended update is an integral part of the current study.

The report is divided into six large parts:

- The second part after the introduction examines the economic effects of sport in the EU, including the impact on GDP and employment as well as establishing the growth potential through multipliers and key sectors of the sport economy.
- The third part examines the economic characteristics and effects of sport in each EU Member State.
- The fourth part describes the technical support given to Belgium, together with some detailed results of Belgium's SSA.
- The fifth part presents the report's recommendations on the future implementation of SSAs in the EU.
- Finally, the sixth part is the report's Annex including: the methodology used; data sources and issues with data consistency, foreign trade and IOTs; minutes of workshops and meetings; and finally, the national data sheets used in the analysis.

[9] http://eur-lex.europa.eu/legal-content/EN/TXT/?uri=uriserv:OJ.C_.2012.393.01.0020.01.ENG

[10] http://register.consilium.europa.eu/doc/srv?l=EN&f=ST%209131%202014%20INIT

[11] https://publications.europa.eu/en/publication-detail/-/publication/d44cae16-23bc-4cee-8bc8-f1411c447464

2 Economic Effects of Sport: European Union

2.1 Comments on the Method

The model chosen for the calculations of the final results is a Multiregional Input-output table for sport based on national sport satellite accounts. Satellite accounts are detailed sectoral views on parts of an economy which would otherwise remain invisible within their main sectors. As an example, the production of sport shoes is part of "textiles, wearing apparel, leather and related products". The sport satellite accounts provide separate sectors for sport shoes which allow specific analyses. This implies strict non-additivity of satellite accounts which is often ignored in public discussions. As an example, sport-related tourism is a part of the sport satellite account. However, it also shows up in tourism satellite accounts. Adding the effects of both satellite accounts would double count sport-related tourism. Because of that, satellite accounts must always be interpreted as stand-alone models.

2.2 GDP

Gross Domestic Product (GDP) is among the main indicators of an economy's performance and certainly the best known to the public. In 2012, the base year of the report, the 28 EU Member States of the European Union reported a GDP totalling 13,198 bn Euros in their Input-output tables which were used for the calculations. Sport related GDP was found to be 279.7 bn Euros or 2.12% of total GDP. Thus, around one in 47 Euros of GDP was generated within sport. This is positioned between the GDP contributions of "land transport services and transport services via pipelines" (289.6 bn Euros) and "computer programming, consultancy and related services; information services" (273.5 bn Euros).

Table 2 shows the top-10 sport-related sectors (out of 42) in terms of GDP. "CPA" is a categorisation of goods and services used in the System of National Accounts (SNA) and is shown as a shorthand notation for the middle column. The GDP of a specific category is presented in million Euros as well as a share of EU's total GDP.[12] Thus, sport education services contribute a little over 51 bn Euros or 0.39% of the EU's GDP, nearly as much as the overall 'forestry and wood products except furniture' sector (55 bn Euros).

[12] To be precise, we are talking about the goods and services produced in a sector, not about the sector itself. We will keep that slightly imprecise wording in the main part of the report. For more details please refer to the annex.

Table 2: GDP contribution of top-10 sport related sectors

Rank	CPA	Goods and Services	GDP in m Euros	Share of total GDP
1	P	Education services	51,237	0.39%
2	R93_1	Sport services	43,075	0.33%
3	O	Public administration and defence services; compulsory social security services	32,244	0.24%
4	I	Accommodation and food services	23,217	0.18%
5	G47	Retail trade services, except of motor vehicles and motorcycles	19,868	0.15%
6	G46	Wholesale trade services, except of motor vehicles and motorcycles	16,352	0.12%
7	F	Constructions and construction works	9,932	0.08%
8	R90-92	Creative, arts, entertainment, library, archive, museum, other cultural services; gambling and betting services	9,493	0.07%
9	Q86	Human health services	8,230	0.06%
10	H49	Land transport services and transport services via pipelines	6,645	0.05%

Source: Own calculations

"Sport services", the second largest sector, is the only major sport-related sector in the SNA. It covers sport facility operations, sport clubs, fitness facilities, and other sport services (e.g. sport promotion or athletes). Generating more than 43 bn GDP or 0.33% of EU's total GDP, it clearly exceeds the overall "printing and recording services" sector, for which 37.8 bn Euros GDP are reported.

Sport-related "public administration and defence services; compulsory social security services" contribute another 32.2 bn Euros to GDP, corresponding to 0.24% of total GDP. These three largest sectors alone create 0.96% of EU's total GDP.

Sport tourism is, at least partially, responsible for "accommodation and food services", retail- and wholesale trade, as well as land transport services. "Construction and construction works" are investments into sport infrastructure, such as stadiums or swimming pools. Major sport events can increase this sector's importance, as was the case in the United Kingdom before the Olympic Summer Games in 2012. The sport association with sector R90-92 mainly comes from "gambling and betting services" although there are many sport-devoted museums and other cultural institutions. "Human health services" are two-fold, including treatment of sport-related injuries and sport as a treatment.

Table 3: Sport-related GDP in the EU Member States

Member State	GDP in m Euros	Share of sport-related GDP
AT – Austria	13,066	4.12%
BE – Belgium	4,494	1.16%
BG – Bulgaria	338	0.80%
CY – Cyprus	361	1.85%
CZ – Czech Republic	2,055	1.27%
DE – Germany	104,707	3.90%
DK – Denmark	3,973	1.56%
EE – Estonia	159	0.88%
EL – Greece	1,784	0.93%
ES – Spain	14,984	1.44%
FI – Finland	3,264	1.63%
FR – France	39,923	1.91%
HR – Croatia	676	1.54%
HU – Hungary	1,252	1.26%
IE – Ireland	1,804	1.03%
IT – Italy	21,217	1.32%
LT – Lithuania	283	0.85%
LU – Luxembourg	630	1.43%
LV – Latvia	142	0.64%
MT – Malta	129	1.81%
NL – The Netherlands	7,973	1.24%
PL – Poland	8,952	2.30%
PT – Portugal	1,879	1.12%
RO – Romania	1,389	1.04%
SE – Sweden	5,949	1.41%
SI – Slovenia	609	1.69%
SK – Slovakia	956	1.31%
UK – United Kingdom	36,750	2.18%[13]

Source: Own calculations

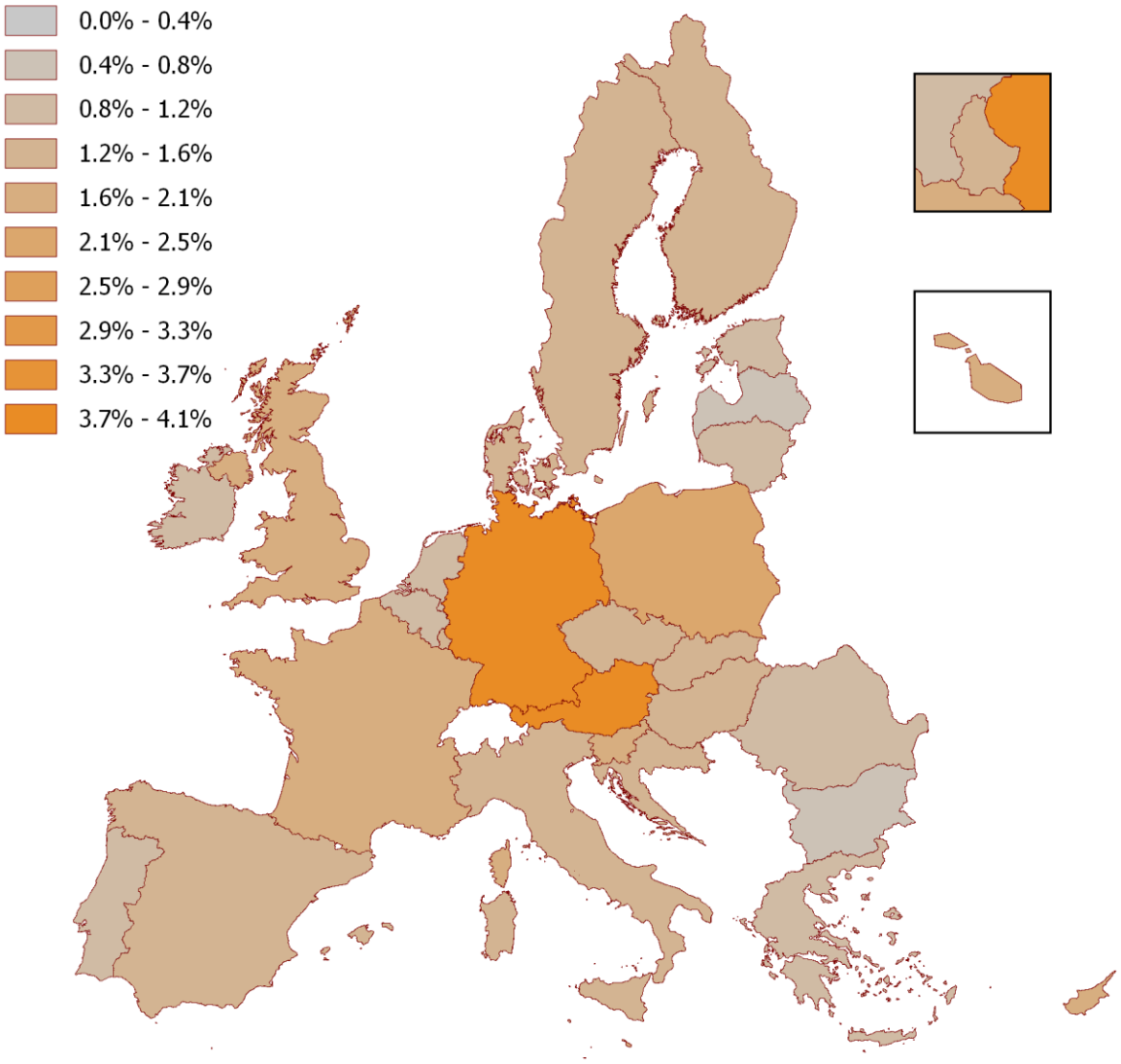
Production of sport-related goods and services is not only distributed differently among sectors, but also among MSs. Values are reported in

Table 3 and Figure 1. At first glance one can see that the shares vary widely from 0.80% to 4.12% which is a little more than factor 5.1. Such variations, however, are normal. For example, the GDP

[13] For consistency with the SSA of the United Kingdom, the overall GDP was taken from the national IOT.

share of total agriculture (sport plus non-sport) ranges from 0.34% in Luxembourg to 4.84% in Romania – thus by a factor of 14.

Figure 1: Share of sport-related GDP in total GDP



Source: Own calculations

It is important to underline that the production of sport-related goods and services is not (strongly) correlated with sport participation. A short description of every Member State is given below.

2.3 Employment

The second highly important indicator of economic activity is employment. In 2012 a total of 208.55 m employees were reported by the MSs.[14] Out of these, 5.67 m could be attributed to sport which is a share of 2.72%. In other words, one in 37 employees works in a company or institution directly related to sport.

Table 4: Contribution of top-10 sport related sectors to employment

Rank	CPA	Goods and Services	Empl. in heads	Share of total empl.
1	P	Education services	1,110,882	0.53%
2	R93_1	Sport services	749,291	0.36%
3	G47	Retail trade services, except of motor vehicles and motorcycles	586,516	0.28%
4	I	Accommodation and food services	585,892	0.28%
5	O	Public administration and defence services; compulsory social security services	503,059	0.24%
6	G46	Wholesale trade services, except of motor vehicles and motorcycles	345,683	0.17%
7	R90-92	Creative, arts, entertainment, library, archive, museum, other cultural services; gambling and betting services	240,952	0.12%
8	F	Constructions and construction works	179,414	0.09%
9	Q86	Human health services	143,666	0.07%
10	C13-15	Textiles, wearing apparel, leather and related products	124,104	0.06%

Source: Own calculations

The top-10 sectors of sport-related employment are given in Table 4. Naturally, there are similarities with Table 2, reporting GDP, but some variations can be observed. The strongest sector is “education services” with more than 1.1 m employees. They alone form more than 0.5% of the EU total employment. The second largest sector is “sport services” with around 749,000 employees. Third, and thus two ranks higher than in the GDP ranking, are retail services with more than 586,000 employed persons. The reason for this is well known. Retail is one of those sectors which generates a lot of employment for a given value of GDP. These first three sectors provide employment for nearly 2.45 m persons or 1.17% of EU’s total employment. “Accommodation and food services” retain their fourth rank with 585,900 employees – only a few hundred less than retail trade. Sport-related public administration provides employment for 503,000 persons. The remaining sectors, wholesale, creative

[14] Eurostat’s Labour Force survey, variable lfsa_egan22d, age 15 to 64.

arts, cultural services, gambling and betting, construction, human health, and textiles report less than half a million employees.

Employment in the MSs is shown in Table 5. The largest value can be reported for Germany with 1.76 m persons, followed by the United Kingdom with 1.06 m employees and France with more than 582,000. The shares of sport-related employment out of total employment range from 1.22% in Romania to 5.63% in Austria. The variation factor thus is around 4.6, a little less than for GDP.

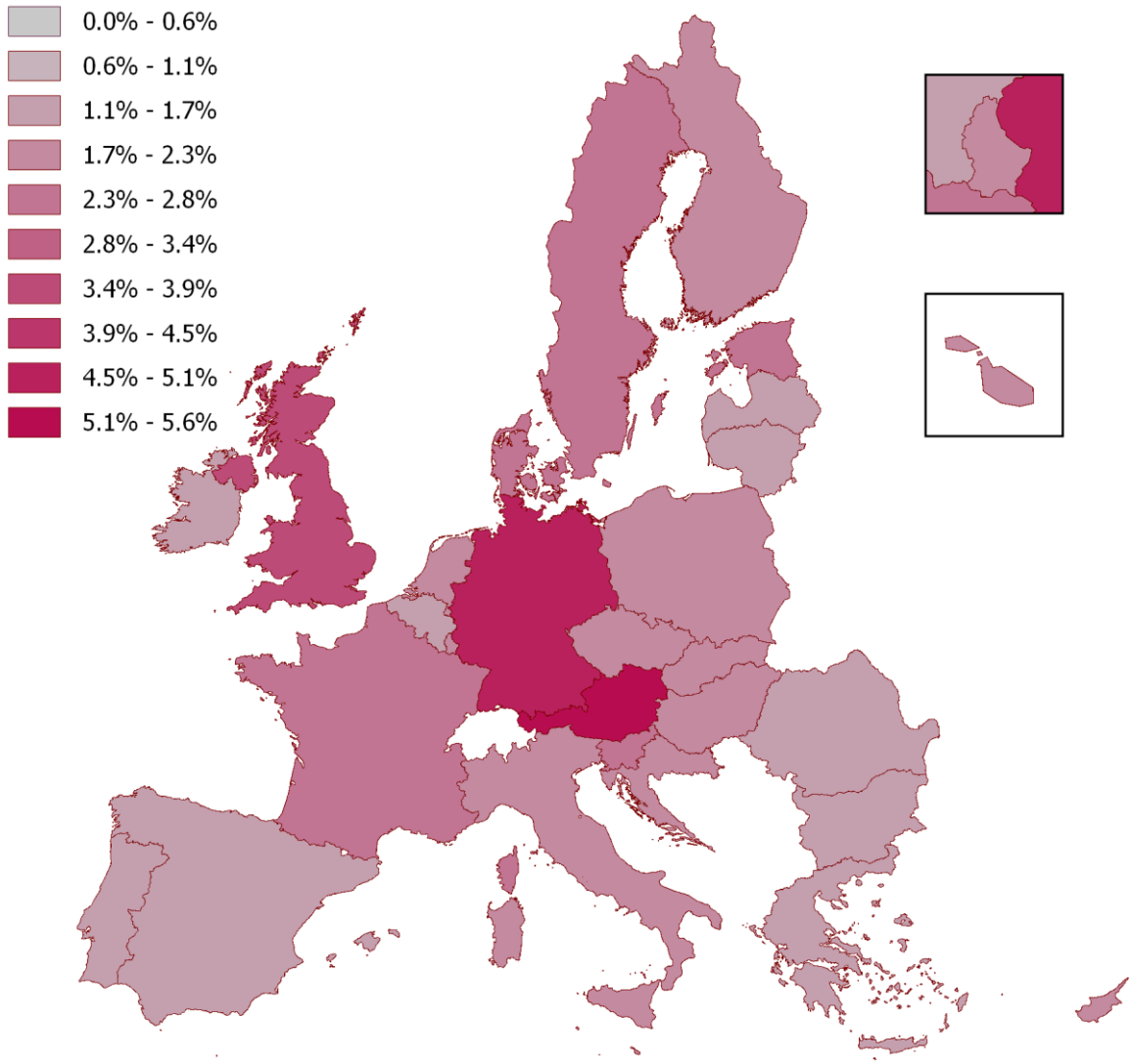
Table 5: Sport-related employment in the EU Member States

Member State	Employment in heads	Share of sport-related employment
AT – Austria	226,129	5.63%
BE – Belgium	71,440	1.59%
BG – Bulgaria	44,756	1.55%
CY – Cyprus	7,813	2.08%
CZ – Czech Republic	84,803	1.76%
DE – Germany	1,761,369	4.60%
DK – Denmark	64,082	2.45%
EE – Estonia	13,656	2.31%
EL – Greece	47,486	1.31%
ES – Spain	261,839	1.50%
FI – Finland	50,634	2.09%
FR – France	582,709	2.29%
HR – Croatia	27,908	1.83%
HU – Hungary	75,771	2.00%
IE – Ireland	30,008	1.68%
IT – Italy	389,120	1.76%
LT – Lithuania	20,043	1.62%
LU – Luxembourg	4,336	1.89%
LV – Latvia	12,611	1.48%
MT – Malta	3,306	1.98%
NL – The Netherlands	150,687	2.04%
PL – Poland	332,939	2.17%
PT – Portugal	59,330	1.39%
RO – Romania	100,279	1.22%
SE – Sweden	109,191	2.43%
SI – Slovenia	21,916	2.43%
SK – Slovakia	47,095	2.03%
UK – United Kingdom	1,064,939	3.75%

Source: Own calculations

Figure 2 depicts the shares of employment in the MSs. As GDP and employment are correlated, the pattern is similar. A notable exception can be found in the Baltic States with Estonia having a much higher sport-share in employment than in GDP.

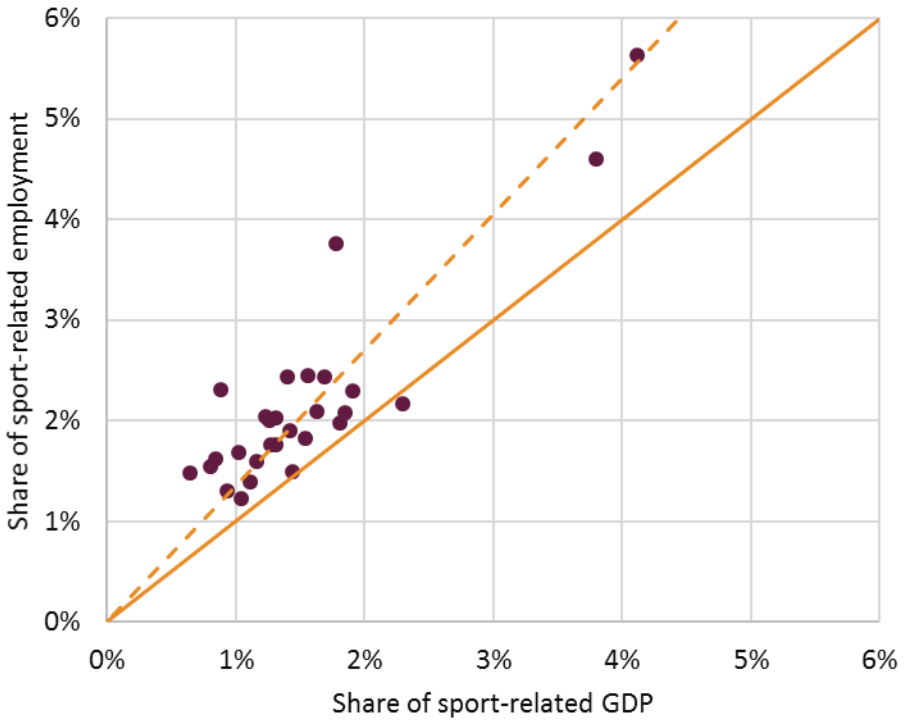
Figure 2: Share of sport-related employment in total employment



Source: Own calculations

Despite this similarity, having a closer look at the shares is an interesting exercise. Figure 3 shows GDP on the horizontal axis and employment in the vertical. The solid 45°-line shows that 27 MSs have higher employment than GDP shares. Only Poland's GDP share surpasses its employment.

Figure 3: Comparison of shares of sport-related employment and GDP. The solid line shows identity of employment and GDP shares, the dashed line the empirical relation



Source: Own calculations

This fact was already found in the previous study and was one of its most important results. It showed that sport is an employment-intensive good: increasing sport-related GDP by 1% increases employment by a little more than 1.35% as is shown by the dashed line. It can be concluded that an active sport-related economic policy can be an effective way to counter unemployment. This result is conditional upon the existence of an effective sport demand and it does not include the high number of volunteers in sport related sectors.

2.4 Sector Specific Multipliers

Other often used indicators of the economic importance of sport sectors are the indirect multipliers. They show how much total output is necessary to produce in order to satisfy a single unit of direct demand. For example, with a multiplier of 2.09, a total of 2.09 million Euros of output needs to be generated throughout the economy, for one million Euros of output in the sector A01 “products of agriculture” to be produced. The more interconnected the economy is and the fewer the products that are imported, the higher the multiplier. Consequently, large economies benefit as they can produce more goods and services on their own. As an example, Cyprus has an average multiplier of 1.51, whilst Germany’s average equals 1.74. In the case of the EU the indirect multiplier is even

higher, reaching 1.94. Table 6 reports the multipliers of the sport-related goods and services in the EU. The lowest value of 1.36 can be found in “education services”. This is no surprise as this sector mainly requires highly-skilled personnel, while intermediate goods are rather unimportant (22.5% of all costs). As a result, education does not strongly stimulate, through the supply network, the rest of the economy, and the multiplier is, thus, low.[15] The highest multiplier of 2.55 is observed in “food, beverages and tobacco products”. This sector has strong connections with agriculture – which itself has a high multiplier. The average multiplier of sport-related goods and services equal 1.95, marginally higher than the average 1.93 of non-sport sectors.

[15] This does not imply that education is unimportant for the economy or society. It only states that through its supply network education services are not strongly connected with the rest of the economy.

Table 6: EU-wide sectoral multipliers or sport-related goods and services

CPA	Goods and services	Mult.
A01	Products of agriculture, hunting and related services	2.09
C10-12	Food, beverages and tobacco products	2.55
C13-15	Textiles, wearing apparel, leather and related products	2.15
C18	Printing and recording services	2.18
C19	Coke and refined petroleum products	1.66
C21	Basic pharmaceutical products and pharmaceutical preparations	1.87
C22	Rubber and plastic products	2.11
C25	Fabricated metal products, except machinery and equipment	2.34
C26	Computer, electronic and optical products	2.14
C29	Motor vehicles, trailers and semi-trailers	2.50
C30	Other transport equipment	2.18
C31_32	Furniture and other manufactured goods	2.14
C33	Repair and installation services of machinery and equipment	2.32
F	Constructions and construction works	2.16
G45	Wholesale and retail trade and repair services of motor vehicles and motorcycles	1.84
G46	Wholesale trade services, except of motor vehicles and motorcycles	1.86
G47	Retail trade services, except of motor vehicles and motorcycles	1.78
H49	Land transport services and transport services via pipelines	1.93
H50	Water transport services	1.74
H51	Air transport services	1.85
H52	Warehousing and support services for transportation	1.98
I	Accommodation and food services	1.95
J58	Publishing services	1.98
J59_60	Motion picture, video and television programme production services, sound recording and music publishing; programming and broadcasting services	1.97
J62_63	Computer programming, consultancy and related services; Information services	1.78
K64	Financial services, except insurance and pension funding	1.99
K65	Insurance, reinsurance and pension funding services, except compulsory social security	2.16
M69_70	Legal and accounting services; services of head offices; management consultancy services	1.78
M72	Scientific research and development services	1.84
M74_75	Other professional, scientific and technical services and veterinary services	1.96
N77	Rental and leasing services	2.02
N78	Employment services	1.99
N79	Travel agency, tour operator and other reservation services and related services	2.28
N80-82	Security and investigation services; services to buildings and landscape; office administrative, office support and other business support services	1.88
O	Public administration and defence services; compulsory social security services	1.51
P	Education services	1.36
Q86	Human health services	1.53
Q87_88	Residential care services; social work services without accommodation	1.59
R90-92	Creative, arts, entertainment, library, archive, museum, other cultural services; gambling and betting services	1.75
R93_1	Sport Services	1.84
R93_2	Sporting services and amusement and recreation services	1.80
S95	Repair services of computers and personal and household goods	1.47

Source: Own calculations

2.5 Key Sectors

Important economic sectors can be identified based on their influence on the rest of the economy. In order to detect such keysectors, Rasmussen (see Hewings and Jensen (1986), Hübler (1979), or Miller and Blair (1985)) developed an index which is easy to interpret. If a sector spreads as many stimuli to the rest of the economy as it receives, it has an index of 1.0. If it distributes twice as much, the index equals 2.0.

In Table 7 and Table 8 these indices are shown for all sport-related sectors of the MSs. Values above 1.0 and 1.5 are marked green and dark green, with bold white numbers, correspondingly. Not every country has important sectors with values above 1.5. As an example, Bulgaria's highest value is 1.23 for gambling and betting. That does not mean that there are not "strong" sport-related sectors, but that the importance of sectors is evenly distributed.

By far the highest value is reported in Belgium's construction sector (2.62), followed by Germany's travel agencies (1.73) and Slovakia's warehousing and transport support services (1.59).

On the EU-wide level, construction (1.24) is the most important sector, followed by food and beverages (1.20), travel agencies (1.17), agriculture (1.10), and sport services (1.10).

It is interesting to note that three of these five key-sectors are the same as in 2005. In that year, food and beverages, construction, and travel agencies were the top three.

Table 7: Key sectors are identified by high Rasmussen indices. Austria to Hungary

	AT	BE	BG	CY	CZ	DE	DK	EE	EL	ES	FI	FR	HR	HU
Products of agriculture, hunting and related services	1.12	1.21	1.10	1.07	1.10	1.09	1.14	1.16	1.01	1.10	1.19	1.13	1.03	1.27
Food, beverages and tobacco products	1.17	1.16	1.22	1.44	1.20	1.20	1.25	1.24	1.24	1.43	1.26	1.28	1.15	1.35
Textiles, w earing apparel, leather and related products	0.94	1.02	0.99	0.96	0.91	1.08	1.02	0.87	1.08	1.23	0.96	1.02	0.98	0.86
Printing and recording services	0.95	1.02	1.14	0.94	1.07	1.13	1.07	0.99	1.02	1.12	1.08	1.02	1.05	1.09
Coke and refined petroleum products	0.81	0.92	0.60	0.67	0.79	0.67	1.20	1.21	0.86	0.72	0.78	0.86	0.93	0.86
Basic pharmaceutical products and pharmaceutical preparations	0.92	0.89	0.99	0.95	1.00	0.96	0.90	0.82	1.13	1.00	0.80	0.91	0.98	0.81
Rubber and plastic products	0.93	0.90	0.99	1.01	0.88	0.98	0.93	0.95	1.04	1.08	0.99	1.00	1.04	0.98
Fabricated metal products, except machinery and equipment	1.08	1.02	1.06	1.04	0.98	1.17	1.05	1.00	1.14	1.17	1.08	1.02	1.03	1.03
Computer, electronic and optical products	0.87	0.92	0.60	0.67	0.77	1.05	0.93	0.69	0.95	0.94	0.94	0.91	1.02	0.78
Motor vehicles, trailers and semi-trailers	0.67	0.83	1.06	0.67	0.99	1.15	0.99	0.82	1.04	1.07	0.95	1.13	1.04	0.81
Other transport equipment	**1.51**	0.99	1.06	1.02	0.86	1.12	1.03	1.17	0.97	0.65	1.12	0.99	1.20	0.95
Furniture and other manufactured goods	0.95	0.99	1.08	0.67	0.97	1.10	0.87	1.02	1.12	1.10	1.04	1.00	1.01	0.99
Repair and installation services of machinery and equipment	0.96	0.94	0.99	0.81	1.08	1.13	0.99	1.03	0.96	1.02	0.98	0.98	1.05	0.94
Constructions and construction w orks	1.16	**2.62**	1.12	1.26	1.34	1.06	1.10	1.15	1.14	1.14	1.14	1.12	1.08	1.11
Wholesale and retail trade and repair services of motor vehicles and motorcycles	0.99	0.91	0.98	0.95	0.96	0.94	0.97	0.96	0.90	0.92	0.96	0.94	0.99	1.09
Wholesale trade services, except of motor vehicles and motorcycles	0.94	0.94	1.08	0.92	1.01	0.99	0.99	1.04	0.98	0.99	0.99	1.09	1.04	1.06
Retail trade services, except of motor vehicles and motorcycles	0.97	0.92	0.93	0.95	0.58	0.97	1.01	1.10	0.91	0.87	0.98	0.95	1.00	1.10
Land transport services and transport services via pipelines	1.05	1.03	0.99	0.96	1.03	1.09	1.06	1.09	1.00	1.03	1.07	0.99	1.08	1.05
Water transport services	1.22	1.02	1.03	0.67	1.26	0.76	0.72	0.69	1.01	1.14	0.95	1.24	1.03	0.96
Air transport services	1.18	1.08	1.11	1.23	1.20	0.93	0.96	1.20	1.04	1.11	1.09	0.98	1.18	0.85
Warehousing and support services for transportation	0.98	1.04	1.05	1.11	1.14	1.06	1.00	0.69	1.00	1.16	1.20	0.98	1.00	1.04
Accommodation and food services	0.94	1.10	1.00	1.09	1.03	1.05	1.07	1.23	1.07	1.01	1.11	1.03	0.97	1.26
Publishing services	1.23	1.11	1.01	0.99	1.04	1.08	1.10	1.22	1.06	1.16	1.06	1.02	1.09	1.12
Motion picture, video and television programme production services, sound recording and music publishing; programming and broadcasting services	1.07	1.02	1.12	1.09	0.98	1.04	1.07	0.69	1.07	1.15	1.00	1.10	1.12	0.93
Computer programming, consultancy and related services; Information services	1.03	1.11	0.60	0.94	0.94	1.04	1.06	0.69	1.00	0.92	0.97	0.92	0.96	0.92
Financial services, except insurance and pension funding	1.01	0.95	0.79	1.04	0.90	1.15	0.94	0.95	0.85	0.83	1.02	1.05	0.83	0.99
Insurance, reinsurance and pension funding services, except compulsory social security	1.10	1.03	0.96	1.11	1.14	1.23	1.11	0.69	1.15	1.04	0.91	1.36	1.07	1.19
Legal and accounting services; services of head offices; management consultancy services	1.06	0.95	1.02	0.81	1.00	1.11	0.92	0.69	0.88	0.87	0.96	1.12	0.88	0.96
Scientific research and development services	0.83	0.92	0.86	0.67	0.68	1.12	1.07	0.89	0.94	0.84	0.83	0.98	0.99	0.91
Other professional, scientific and technical services and veterinary services	1.07	1.21	1.13	0.92	1.24	1.17	1.11	1.08	1.12	0.92	1.09	0.98	1.01	1.02
Rental and leasing services	0.90	1.03	0.98	0.88	0.95	1.17	1.15	0.92	1.05	0.92	1.05	0.97	1.03	0.85
Employment services	0.74	0.74	0.92	0.87	1.21	1.13	1.01	0.69	0.79	0.68	0.81	0.66	0.88	0.83
Travel agency, tour operator and other reservation services and related services	1.00	0.82	1.16	0.93	1.34	**1.73**	0.98	1.34	1.27	1.26	1.14	1.29	1.25	0.91
Security and investigation services; services to buildings and landscape; office administrative, office support and other business support services	0.97	1.06	1.06	0.85	1.05	1.15	1.02	0.69	0.93	0.83	0.97	1.04	0.93	1.04
Public administration and defence services; compulsory social security services	0.90	0.78	0.84	0.85	0.85	0.84	0.89	0.90	0.86	0.79	0.96	0.81	0.92	0.90
Education services	0.75	0.70	0.80	0.77	0.75	0.86	0.84	0.89	0.71	0.68	0.84	0.75	0.83	0.87
Human health services	0.85	0.98	0.91	0.90	0.80	0.83	0.85	0.86	0.84	0.85	0.93	0.76	0.91	0.94
Residential care services; social w ork services w ithout accommodation	0.89	0.81	1.00	0.90	0.80	0.84	0.83	0.69	1.04	0.87	0.84	0.74	0.91	0.94
Creative, arts, entertainment, library, archive, museum, other cultural services; gambling and betting services	0.87	1.02	1.23	1.02	1.01	0.85	0.92	1.09	0.95	0.93	1.03	0.96	0.93	1.07
Sport services	0.97	1.11	1.09	1.01	1.23	0.76	1.00	1.21	1.11	1.01	1.05	0.99	1.05	1.20
Sporting services and amusement and recreation services	0.97	1.11	1.10	0.93	1.23	0.90	1.00	1.20	1.11	0.94	1.05	0.99	1.05	1.20
Repair services of computers and personal and household goods	0.89	0.97	0.92	0.93	0.98	0.84	1.00	0.98	0.76	0.99	0.94	0.86	0.95	0.96

Source: Own calculations

Table 8: Key sectors are identified by high Rasmussen indices. Ireland to United Kingdom

	IE	IT	LT	LU	LV	MT	NL	PL	PT	RO	SE	SI	SK	UK
Products of agriculture, hunting and related services	1.31	1.00	0.72	1.02	0.61	1.22	1.20	1.31	1.11	1.01	1.33	1.10	1.03	1.12
Food, beverages and tobacco products	1.19	1.20	1.23	1.01	1.23	1.16	1.17	0.67	1.22	1.09	1.24	1.15	1.15	1.31
Textiles, w earing apparel, leather and related products	0.93	1.07	0.88	1.11	0.89	0.93	1.06	0.91	0.98	0.99	0.98	1.02	0.85	0.93
Printing and recording services	0.93	1.10	0.87	0.84	1.06	0.83	0.99	0.67	0.98	0.96	1.27	1.21	0.98	1.09
Coke and refined petroleum products	0.79	0.55	0.72	0.84	0.61	0.83	0.78	0.67	0.62	1.05	0.73	0.64	0.78	0.82
Basic pharmaceutical products and pharmaceutical preparations	0.84	0.84	0.94	0.84	0.84	0.83	0.93	1.16	0.62	0.97	0.67	1.07	0.96	0.91
Rubber and plastic products	1.01	1.05	0.72	0.84	0.61	0.83	1.04	0.67	0.93	1.06	1.00	0.95	1.01	0.96
Fabricated metal products, except machinery and equipment	0.99	1.09	0.72	0.84	0.61	1.06	1.10	1.20	1.10	1.01	1.12	1.20	0.98	0.96
Computer, electronic and optical products	0.91	0.91	0.72	0.84	0.61	0.83	0.84	0.67	0.62	1.01	0.96	0.99	0.94	1.06
Motor vehicles, trailers and semi-trailers	0.99	1.20	0.95	0.84	1.05	0.83	1.02	0.67	0.91	1.13	1.09	0.92	0.98	1.15
Other transport equipment	0.96	1.21	0.88	0.84	1.13	0.83	1.15	1.22	0.98	1.02	0.98	1.16	0.93	1.00
Furniture and other manufactured goods	0.79	1.07	0.98	0.84	1.06	0.83	0.98	1.21	1.03	1.10	1.02	1.00	1.01	1.03
Repair and installation services of machinery and equipment	0.99	1.04	1.05	0.84	1.14	1.06	1.14	1.18	1.02	0.88	1.04	0.93	1.03	1.06
Constructions and construction w orks	1.26	1.27	1.09	0.95	**1.54**	1.30	1.20	1.33	1.32	1.11	1.10	1.38	1.17	1.16
Wholesale and retail trade and repair services of motor vehicles and motorcycles	0.94	1.08	0.83	1.13	1.06	1.11	1.02	0.67	1.05	1.03	0.96	1.01	0.95	0.94
Wholesale trade services, except of motor vehicles and motorcycles	1.03	1.05	0.99	1.24	1.21	1.09	0.95	0.67	1.08	1.16	0.67	1.08	0.98	1.08
Retail trade services, except of motor vehicles and motorcycles	1.04	0.94	0.92	1.46	0.95	1.11	0.96	0.67	1.11	1.11	0.67	0.96	0.98	1.01
Land transport services and transport services via pipelines	1.14	0.98	1.07	1.19	1.09	0.83	1.08	1.11	1.00	1.02	1.05	1.09	0.99	1.02
Water transport services	1.27	1.23	0.72	0.84	0.61	1.44	0.93	0.67	1.25	0.87	1.02	0.86	1.08	1.15
Air transport services	1.06	1.12	1.14	0.84	0.89	0.83	1.04	0.67	1.02	1.11	0.92	1.20	0.95	0.96
Warehousing and support services for transportation	1.08	1.07	0.72	0.84	0.61	1.20	1.06	0.67	0.89	1.00	0.67	1.14	**1.59**	1.19
Accommodation and food services	1.05	1.02	0.99	1.21	1.20	1.27	1.03	1.22	1.18	0.88	1.11	1.03	1.00	0.99
Publishing services	0.79	1.05	1.19	1.13	1.19	1.05	1.07	1.04	1.03	0.98	1.07	1.20	0.98	1.05
Motion picture, video and television programme production services, sound recording and music publishing; programming and broadcasting services	0.79	1.08	0.72	1.00	0.61	0.83	1.10	1.28	0.92	1.20	1.20	1.14	1.12	1.02
Computer programming, consultancy and related services; Information services	0.97	0.97	0.72	1.26	0.61	0.83	0.98	0.67	0.87	0.89	1.01	0.99	0.95	0.88
Financial services, except insurance and pension funding	1.18	0.84	0.99	1.46	0.98	0.86	0.82	0.67	0.88	0.87	0.93	0.92	0.91	1.01
Insurance, reinsurance and pension funding services, except compulsory social security	1.25	1.11	1.29	1.35	1.05	0.95	1.06	0.67	0.94	1.06	0.94	1.07	1.25	1.13
Legal and accounting services; services of head offices; management consultancy services	1.03	0.89	0.72	1.13	0.61	1.10	1.05	0.67	0.94	1.08	1.04	0.97	0.96	0.82
Scientific research and development services	0.88	0.92	1.00	0.84	0.76	0.83	0.94	0.67	0.88	0.86	0.99	0.83	0.85	0.97
Other professional, scientific and technical services and veterinary services	1.06	0.94	0.95	0.91	1.06	1.18	1.03	0.67	0.96	1.10	1.16	0.80	0.99	0.89
Rental and leasing services	0.94	1.08	1.00	0.84	0.91	1.27	0.96	0.67	1.21	1.03	0.98	0.89	0.97	0.95
Employment services	0.91	0.68	0.72	0.84	0.61	0.96	0.81	0.67	0.62	1.01	0.92	0.74	0.79	1.04
Travel agency, tour operator and other reservation services and related services	0.85	1.34	1.14	0.84	1.28	1.31	1.12	1.23	1.39	1.33	1.05	1.04	1.38	1.03
Security and investigation services; services to buildings and landscape; office administrative, office support and other business support services	1.00	1.04	1.00	0.94	1.01	0.83	0.92	0.67	1.17	1.02	1.02	0.91	0.97	0.88
Public administration and defence services; compulsory social security services	1.10	0.75	0.95	1.04	0.89	1.00	0.97	0.68	0.76	0.78	1.00	0.91	0.85	0.90
Education services	0.97	0.68	0.91	0.93	0.81	0.93	0.79	0.83	0.69	0.74	0.94	0.78	0.82	0.81
Human health services	0.95	0.83	0.92	1.03	0.82	0.94	0.85	0.69	0.96	0.82	0.90	0.83	0.92	0.83
Residential care services; social w ork services w ithout accommodation	0.79	0.96	0.72	1.04	0.61	0.95	0.86	0.67	0.97	0.80	0.86	0.85	0.94	1.11
Creative, arts, entertainment, library, archive, museum, other cultural services; gambling and betting services	0.88	1.09	1.43	1.16	0.98	0.92	0.99	1.14	0.98	0.82	1.12	0.91	0.81	0.93
Sport services	0.85	1.13	1.33	1.18	1.12	1.23	1.09	1.31	1.15	1.05	1.15	1.16	1.12	1.14
Sporting services and amusement and recreation services	0.85	1.13	1.36	1.18	1.12	1.23	1.08	0.67	1.15	1.05	1.15	1.16	1.12	0.62
Repair services of computers and personal and household goods	1.04	0.96	0.93	1.02	1.13	1.01	0.98	0.87	0.82	0.90	0.93	0.92	0.78	0.86

Source: Own calculations

3 Economic Effects of Sport: Member States

3.1 Explanatory Notes

For the SSA calculations, national sport-related data has to be gathered. Nine MSs (Austria, Belgium, Cyprus, Germany[16], Lithuania[17], the Netherlands[18], Poland[19], Portugal[20], and the United Kingdom[21]) have their own national SSAs which were used with as few changes as possible. Two more MSs, Croatia and Luxemburg have already started their own research: Croatia is at the stage of initial calculations whilst Luxembourg has already progressed towards constructing a national SSA. Other countries (Bulgaria, Spain, France, and Slovakia) provided a substantial amount of data which also allowed for high precision of the results. The remaining MSs were searched for data as well as possible. Databases provided a lot of important data (for example employment of the core sector "sport services"). If no information was available, it was either calculated (as an example: imports plus production equals export plus consumption) or estimated from countries with similar economic structures. Although the proxy results for those remaining MSs certainly contribute well for the purpose of the EU-wide model, they cannot replace a fully-fledged national SSA for domestic policy evaluation.

Employment of the core sector "sport services" was provided by Eurostat. Data for Croatia, Lithuania, Luxembourg, and Malta was labelled as being not enough reliable or confidential. It was used for calculation, but are not published in the report. The exception is Lithuania which has calculated that statistic on its own. Employment data is mainly taken from Eurostat's Labour Force Survey[22] which differentiates between employment and employees. The latter "are defined as those who work for a public or private employer and who receive compensation in the form of wages, salaries, payment by results, or payment in kind; non-conscript members of the armed forces are also included".[23] Self-employed persons are defined as those who "work in their own business, farm or professional practice"[23]. Throughout this report we always refer to the overall concept of employment, even if the word "employees" or any other term is used for the sake of better readability.

---

[16] Ahlert G., an der Heiden I. (2015)
[17] Statistics Lithuania (2016)
[18] CBS (2015)
[19] Liberda, Tomaszewicz, Świeczewska, and Tręska. (2015)
[20] https://www.ine.pt/xportal/xmain?xpid=INE&xpgid=ine_cnacionais2010&contexto=cs&selTab=tab3&perfil=220677460&INST=220617355
[21] DCMS (2016)
[22] Variable lfsa_egan22d, main exceptions are employment data from national SSAs.
[23] http://ec.europa.eu/eurostat/statistics-explained/index.php/Employment_statistics#Main_concepts

3.2 Austria

Austria's sport economy (calculated by SpEA) is dominated by winter sport (43 m overnight stays compared to 23 m in the summer[24]), which is mainly practiced in the mountainous areas of western and central Austria. Due to this geographical advantage, many foreign tourists (55 m overnight stays compared to 11 m domestic tourists) push up the numbers substantially, creating a leverage effect. Austria's sport tourism overnight stays (66 m) surpass total tourism (sport plus non-sport) of 20 MSs. Only Germany, Greece, Spain, France, Italy, the Netherlands, and the United Kingdom report more total overnight stays than there are sport-related overnight stays in Austria. Combining that with the fact that Austria has less than half of the EU-average's inhabitants, it becomes plausible that Austria sport-related GDP has a share of 4.12% of the total value and 5.63% of employment. Accordingly, the largest contributors are accommodation and food services (3.7 bn Euros GDP and 65,400 employees) and retail (1.7 bn Euros GDP and 38,363 employees), followed by education (1.6 bn Euros GDP, 24,700 employees), and human health services (close to 1.4 bn Euros GDP, 22,900 employees). These four sectors alone provide 2.65% of total GDP 3.78% of total employment.

3.3 Belgium

Belgian (additional data provided by the Administration Générale du Sport, the Sport Administration of the Federation Wallonia-Brussels, the General Statistics Department in the National Bank of Belgium, and Statistics Belgium) sport-related GDP was found to be 1.16% (4.49 bn Euros) of total GDP while sport employment corresponded to 1.59% of its total value. This relation of around 1.37 between the before-mentioned percentages is a little above the EU average, underlining the importance of sport for Belgium's employment policy. By far the most important sport-related sector was education, associated with a GDP of 1.96 bn Euros and 32,720 employees. That alone corresponds to 0.50% of total GDP and 0.73% of Belgium's total employment, or equivalently, 44% and 46% of sport GDP and sport-related employment respectively. Following education, important effects can be found in sport services, wholesale, retail, publishing, public administration, and accommodation and food services. Sport construction, although comparatively small, (with only 14.2 m Euros GDP) is an outstanding key-sector as it distributes 2.62 times more stimuli to the rest of the economy than it receives – the highest ratio of all sport-related sectors in the EU. Fort the existing calculations data were provided by the Administration Générale du Sport, the Sport

[24] Special data request by SpEA to MANOVA Gmbh.

Administration of the Federation Wallonia-Brussels, the General Statistics Department in the National Bank of Belgium, and Statistics Belgium.

3.4 Bulgaria

Bulgaria is a striking example of how much employment can be generated by sport. Although sport accounts for only 0.80% of GDP, 1.55% of the economy's employment directly depends on sport (44,700 persons). Thus, share-wise, nearly twice as much employment is created as GDP (factor 1.94). Although 0.80% of GDP might not seem to be significant at face value, sport is ranked 25th among the 65 existing broad economic sectors in terms of GVA and 14th in terms of employment. This is due to the fact that the Bulgarian economy is characterised by the presence of a few very large sectors and many comparatively small ones. The four most important sport-relevant sectors are education, public administration, textiles, and sport services. They alone represent 0.61% of the national GDP and 1.17% of employment.

3.5 Croatia

In the Croatian sport industry, 29% of sport-related GDP is produced by education services and 26% by sport services. Sport tourism also plays a key role as accommodation and food services related to sport account for 13% of sport-GDP. Another 4% of sport-related GDP is accrued through retail of sport-related goods. The public administration and defence services sector also accounts for 4% of GDP in the Croatian sport industry. Overall, the sport-related part of Croatian GDP is valued at 676.1 m Euros, generating 27,900 of employment. The largest employment share is located in the education services with 10,626 persons (38%). This is followed by sport services and accommodation and food services at 12%. A further 8% of sport industry employment occurs in the retail of sport-related goods, followed by 5% in the production of sporting equipment. Taken together, the top three sectors contributing to the Croatian sport industry (in terms of both GDP and employment) – namely, education services, sport services and accommodation and food services – account for 1.05% of total GDP. The sport industry as a whole accounts for a sizeable share of 1.54% of Croatian GDP. Regarding employment, 1.83% of the total 1,524,700 persons employed in Croatia work in the sport industry. The top three sectors generate 1.16% of this.

3.6 Cyprus

The sport-related manufacturing industry of Cyprus (calculations of the national SSA done by George Zeitountsian) is fairly small, but sport-related services and education are sizable. The main domestically produced services, apart from sport services themselves, are sport betting, trade, radio and TV sport casting, human health services, trade, and construction. Overall, the sport industry accounts for a considerable share of 2.08% of total employment in Cyprus. This is in line with the general profile of the economy as a service based industry. At first glance, compared to 2005, it seems as if Cyprus' sport economy's share in the total economy has decreased. This reduction, however, can be attributed to a number of changes in the methodology of the adoption of the European System of Accounts ESA 2010, new information and improved data from statistical sources, and methodological improvements resulting from the recommendations of special Task Forces at the European level. The impact of these revisions on GDP is much bigger for the recent years (9.8%) and hence the contribution of sport in 2012 seems to decline. The Shipping, Tourism and Banking contribution to GDP has increased whilst the share of sport activities' contribution has become smaller. However, the Cypriot sport industry still contributes a sizeable share of 1.85% to total GDP. The top three sectors making the largest contributions to Cyprus' sport GDP can account for 1.07% of total GDP. Since the share of sport employment is greater than the share of sport GDP, it can be concluded that the sport economy in Cyprus is efficient in generating employment. This is especially evident in the case of sport tourism, combining sport infrastructure with Cyprus' natural competitive advantages.

3.7 Czech Republic

In 2012, the sport related GDP of the Czech Republic was valued at about 2,055.5 m Euros. This is equivalent to 1.27% of total GDP. The top three sectors, making the largest contributions to the sport industry in terms of GDP, generate a cumulative 0.76% of total GDP. The most important sector is education services, accounting for about one quarter of sport-related GDP (23%) and employment (27%). Another important sector is the production of motor vehicles, trailers and semi-trailers for sport, contributing one fifth (20%) to sport GDP and 16% to employment. Sport services also contribute a sizeable fraction to the Czech sport economy accounting for 16% of GDP and 21% of employment. Human health services account for 7% each of sport-related GDP and employment. Another 5% of sport-related GDP stems from accommodation and food services. An additional 5% of sport-related employment occurs in the production of sporting equipment and other related manufactured goods. Overall, 84,800 persons were employed in the Czech sport industry (measured

as heads), corresponding to 1.76% of total employment. The top three sectors making the largest contributions to sport employment (education services; motor vehicles, trailers and semi-trailers; and sport services) generate a cumulative 1.13% of total Czech employment.

3.8 Denmark

The key sport-related sectors in Denmark are education and sport services, with GDP contributions of 30% and 22%, and employment contributions of 26% and 33%, respectively, to the sport industry. In 2012, the overall GDP of the Danish sport industry was 3,972.6 m Euros. This corresponds to 1.56% of total GDP in Denmark. The top three sectors in terms of sport-GDP (education services, sport services and human health services) generate 0.94% of total Danish GDP. Within the sport industry, sport-related human health services account for 8% of sport GDP and 6% of employment. Other relevant GDP contributions are made by wholesale trade services (7%) and publishing services (4%). This demonstrates that the Danish sport industry is almost entirely service-based. In terms of employment in the sport industry, retail trade services and sporting services account for 7% and 5% correspondingly. In total, employment in sport was 64,000, which constitutes a considerable share of 2.45% of total Danish employment. The top three sectors making the largest contributions to employment in the Danish sport industry (sport services, education services and retail trade) account for 1.62% of total employment.

3.9 Estonia

Education services is the largest sport-related sector in Estonia, contributing 35% to both sport-related GDP and employment. Sport services account for 8% of GDP and 20% of employment in the sport industry. Other key sectors are Motor vehicles, trailers and semi-trailers and other transport equipment produced for sport-related activities. Motor vehicles account for 9% of sport GDP and 7% of employment, while the production of other transport equipment generates 6% each of GDP and employment in the sport industry. Sport-related gambling and betting services make up a further 6% of sport GDP in Estonia, which is partly attributable to the surge in online-gambling over recent years. Total sport-related GDP was valued at 158.7 m Euros in 2012. In terms of total GDP, the Estonian sport industry has a comparatively small share at 0.88%. Of the 13,000 employees in the sport industry, 7% work in the production of sport textiles and apparel. Overall, employment in the sport industry contributes a sizeable share of 2.31% to total employment in Estonia. The top three sectors in terms of employment (education services, sport services and motor vehicles, trailers and semi-trailers) make a joint contribution of 1.45% to total Estonian employment. Hence, the Estonian sport

industry produces a significant amount of employment relatively to its GDP, underlining the effectiveness of the sport sector to generate jobs.

3.10 Finland

The Finnish sport economy is dominated by two sectors: sport services and education services. Sport services contribute 36% to GDP and 41% to employment of the sport industry, while education services account for 29% of sport GDP and 27% of sport employment. In 2012, the sport economy generated 3,263.6 m Euros of GDP, equivalent to 1.63% of the total economy. Taken together, the top two sectors sport services and education services generate a sizeable share of 1.07% of total GDP. Other relevant sectors contributing to sport GDP in Finland are publishing services (6%), wholesale trade (5%) and retail trade (4%). A similar pattern is visible in sport-related employment, where retail accounts for a share of 6%, followed by publishing services with a share of 4%. Accommodation and food services related to sport tourism constitute another 4% of employment in the Finnish sport industry. Overall, employment in the sport industry amounts to 50,600 persons or 2.09% of total Finnish employment. Cumulatively, the top two sectors of sport services and education services account for a sizeable share of 1.43% in total employment in Finland.

3.11 France

The sport industry in France generated 39,923.3 m Euros of GDP in 2012, corresponding to 1.91% of total French GDP. The largest sectoral contributions came from education services with 33% of sport GDP, followed by public administration and defence services, and sport services, with 27% and 20% correspondingly. Cumulatively, these top three sectors of the sport industry generate 1.53% of total French GDP, which demonstrates the important role of the public sector for the sport economy in France. Taking all sectors together, 582,700 persons were employed in the French sport industry in 2012, which is equivalent to a sizeable share of 2.29% of total French employment. The largest sectoral share comes from education services, which generates 38% of industry employment. Public administration accounts for an additional 29% of sport-related employment, followed by sport services with 14%. Cumulatively, these three sectors contribute 1.86% to the total employment in France.

3.12 Germany

With a share of 3.9% of GDP (104,707 m Euros) and 4.6% of employment (1,761,300 persons) the sport industry has a significant impact on the German economy (calculations of national SSA by GWS mbH, coordination and additional information by IW Köln). The total sport based production activities account for a proportion of the national Gross Value Added – and thus GDP – are comparable to the direct impact of the German automotive industry. The biggest part of the industries linked to sport in Germany is provided by the public and private services sector. Approximately a third of the GDP generated by sport in Germany is linked to such services. Also, wholesale and retail trade amounts for a big part, since most of sport-related goods and services are consumed by private households. On an international comparison, the German sport sector accounts for a higher-than-average proportion of the total national GDP than in most other European countries.

3.13 Greece

The Greek sport industry generated GDP of 1,784.1 m Euros in 2012, which corresponds to a share of 0.93% of total Greek GDP. The lion's share of this is attributable to education services, which generate 46% of sport related GDP in Greece. Sport services add another 9% to sport GDP. A further 16% of sport GDP is generated by accommodation and food services (8%) and wholesale trade (8%). In total, 47,400 persons were employed in the Greek sport industry, most notably in education services, which account for 49% of sport-related employment and 0.64% of total employment in Greece. Sport services account for a further 12% of sport employment, followed by retail trade with 11%. The provision of accommodation and food services for sport tourism generates an additional 8% of employment in the Greek sport industry. Overall, 1.31% of total Greek employment is generated within sport.

3.14 Hungary

The Hungarian economy generated sport-related GDP of 1,251.7 m Euros and employment of 75,700 persons. About half of this was generated in education services, which account for 46% of GDP and 52% of employment in the sport industry. Thus, compared to most of the other EU MSs discussed here, sport education plays a very large role for the sport economy in Hungary. Other relevant sectors are sport services with 12% of GDP and 10% of employment in the sport industry as well as accommodation and food services for sport tourism, with a share of 8% in sport-related GDP and 10% in employment. Smaller shares are also generated by the public administration and defence

sector (7% of GDP and 4% of employment). The publishing of sport books, brochures and other media generates another 4% of sport-related GDP. Finally, the retail of sport-related goods accounts for a further 5% of sport-related employment. Overall, the Hungarian sport industry is heavily service-based.

3.15 Ireland

The Irish sport industry is driven by the sport services and education services sectors. Of the 1,803.7 m Euros sport-related GDP, 30% (539.6 m Euros) is attributable to sport services and about one quarter (24%) to education services (432.6 m Euros). In terms of sport employment, Ireland generates 30,008 jobs. The before-mentioned sectors of sport services and education services generate sport employment shares of 38% and 21% correspondingly. Wholesale and retail trade of sport-related goods also make notable contributions of 8% and 5%, respectively, to the GDP of the Irish sport industry. With 2,600 employees, retail accounts for 9% of sport-related employment. Another relevant sector is accommodation and food services provided in a sport-context – this accounts for 4% of sport-related GDP and 7% of employment.

3.16 Italy

The sport industry in Italy is structured slightly more diversely than in most other EU Member States. The prominent sectors education services and sport services still rank at the top, but they contribute smaller shares of 23% and 15%, respectively, to sport-related GDP. This is followed by transport services via land and pipelines (10%), accommodation and food services (8%) and the creative/entertainment/cultural services and gambling and betting services sectors (8%). Overall, 21,216.9 m Euros of sport-related GDP is generated in Italy, corresponding to 389,100 persons employed in the Italian sport industry. Of these, 27% are in education services and 19% in sport services. The provision of accommodation and food for sport tourists generates employment of 34,195 employees (9%). A further 12% of sport-related employment is generated in in transport services via land and pipelines (6%) and the creative/entertainment/cultural services and gambling and betting services sectors (6%).

3.17 Latvia

In Latvia, sport-related economic activity mainly takes place in three key sectors: education services; sport services; and the creative/entertainment/cultural services and gambling services sectors. Education accounts for the lion's shares of sport-related GDP (38%) and employment (49%). Sport services generate 19% of both GDP and employment in the sport industry, while 14% of sport GDP and 13% of sport employment takes place in the creative/ entertainment/ cultural services and gambling services sector. A small contribution also comes from the retail of sporting goods, which accounts for shares of 4% in both sport-related GDP and employment. Across all sectors, the Latvian sport industry generated GDP of 142 m Euros and employment of 12,600 persons.

3.18 Lithuania

Lithuania (calculation of national SSA by Statistics Lithuania[25]; coordination by Professor Vilma Cingiene of Mykolo Romerio University) is among the countries with the highest difference between shares of GDP (282.5 m Euros or 0.85%) and employment (20,000 persons or 1.62%). The ratio of 1.91 in-between the two percentages highlights the outstanding importance of sport as an employment driver. The most important sectors in terms of GDP are education (98.1 m Euros or 0.29% of total GDP), production of other transport equipment (34.1 m Euros or 0.1% of GDP), culture and betting (23.1 m Euros or 0.07%), sport services (22.9 m Euros or 0.07%), and wholesale (21.3 m Euros or 0.06%). The order in terms of employment is a little different with education being first again (8,100 persons or 0.66%), followed by sport services (4,200 persons or 0.34%, production of other transport equipment (1,300 persons or 0.11%), production of textiles (1,100 persons or 0.09%), and culture and betting (1,000 persons or 0.09%). The main contributors to GDP are actually among the most labour-intensive sectors of the country, thus giving the sport sector such a high share of employment. It is also worth noting that culture and betting have a disproportionally high share of sport GDP contribution, compared to the EU, with sport betting being the most important category between them in terms of generated output.

[25] Statistics Lithuania (2016)

3.19 Luxembourg

The sport economy of Luxembourg (calculation of national SSA done by Richard Anner of the Ministry of Sport) is, as in the case of many other MSs, dominated by education (177 m Euros GDP and 1,600 employees) and sport services (138.0 m Euros GDP). The third largest sector is financial services with 100.9 m Euros GDP and 288 employees. This is followed by publishing (49.9 m Euros), accommodation and food services (28.9 m Euros), and wholesale (24.2 m Euros) in terms of GDP, and accommodation and food services (283), retail (186), and public administration (183) in terms of employment. In total, the calculations revealed a sport-relevant GDP of 629.6 m Euros (1.43% of total GDP) and a respective employment of 4,300 persons (1.89%). One of the remarkable assets of Luxembourg is a database which allows detailed research on public sport infrastructure. This allows to determine, with high precision, the GDP generated by sport construction at 19.0 m Euros. As construction usually is an important sector, such databases are advisable for all MSs.

3.20 Malta

The composition of Maltese GDP in the sport industry is quite different from the other EU Member States. The largest share is generated in the creative/entertainment/cultural services and gambling and betting services sector with 24.5 m Euros (19%). However, only 4% of sport-related employment occurs in this sector. The sectors education (16% of sport GDP) and sport services also make a sizeable contribution. They also account for a large share in sport-related employment with 26% and 15%, respectively. Sport tourism makes an important contribution by generating 11.8 m Euros (9%) of sport-related GDP and 14% of employment (400 persons) via the provision of accommodation and food services. The SSA results also demonstrate that retail and wholesale trade are important sectors in the sport industry of Malta. Wholesale trade generates 8% of sport-related GDP and 6% of employment, while retail accounts for 11% of employment in the sport industry. Overall, GDP of 129.4 m Euros and employment of 3,300 persons is generated in the sport industry of Malta.

3.21 Netherlands

The Dutch sport economy contributes 1.24% to total GDP and 2.04% to total employment.[26] The high ratio of 1.65 between the two percentages indicates the importance of sport for employment policies. The largest sectors are education (1,716.5 m Euros GDP, 27,900 employees), sport services (1,592.9 m Euros GDP and 49,100 employees), wholesale (1,000.8 m Euros GDP and 5,300 employees), public administration (948.0 m Euros GDP, 9,200 employees) and accommodation and food services (715.5 m Euros GDP, 21,400 employees).

3.22 Poland

The Polish sport economy - as calculated originally by Liberda B., Tomaszewicz Ł., Świeczewska I., and Tręska J. (2015)- has a share of 2.30% of national GDP and 2.17% of employment. It is the only case found where the percentage contribution to employment is smaller than to GDP. However, the top-3 sectors aggregate to 1.13% of GDP and 1.21% of employment – the standard order found in all other MSs. It is the smaller sectors which generate more GDP than employment. The largest sectors are education (1,668.6 m Euros GDP, 78,800 employees), construction (1,467.1 m Euros GDP, 38,700 employees), culture and betting (CPA R90 to R92, with 1,275.7 m Euros GDP and 54,500 employees), and sport services (1,112.9 m Euros GDP, 51,900 employees). Manufactured goods mainly come from the textile industry, sport equipment, metal industry, and also pharmaceuticals.

3.23 Portugal

Portuguese sport economy (original calculations in Statistics Portugal (2016)) adds up to 1,878.6 m Euros or 1.12% of the country's GDP and 59,300 or 1.39% of total employees. Portugal's largest sectors include sport services (576.5 m Euros GDP, 12,300 employees), education (377.8 m Euros GDP, 11,500 employees), and retail (214.2 m Euros GDP, 11,800 employees). However, the distribution of effects is not as much dominated by just a few sectors as in other countries. Additionally, sport participation is biased towards football. On one side, Portugal is the European football champion and it is said to have some of the best football players and coaches. On the other side, football is three or four times the size of the second largest team sport, volleyball. Sport investigators suggest that, in total, 50% of the population practice sport activities and also that the non-for-profit organisations have serious difficulties to survive without proper sport policy.

[26] Note that the official publication in CBS (2015) reports lower values (1.0% of GDP (page 18) and 1.3% of employment (page 17)) as their approach to data gathering and calculation is more reserved.

3.24 Romania

The driving sector of sport-related economic activity in Romania is education services – accounting for 32% of GDP and 26% of employment in the industry. Sport services also play an integral part, generating 13% of sport-related GDP and 12% of employment in the sport industry. The production of sport textiles and apparel has a particularly important role in Romania compared to the other EU Member States, generating 11% of sport-related GDP and 19% of sport-related employment. The production of motor vehicles, trailers and semi-trailers for sport-related activities adds a further 8% to industry GDP, while wholesale trade adds another 5%. Regarding employment in the Romanian sport industry, 10% takes place in retail followed by 8% in the production of sporting equipment and other sport-related manufactured goods. Overall, the Romanian sport industry produces 1,388.8 m Euros of GDP and generates 100,200 of employment.

3.25 Slovakia

In Slovakia (additional data provided by Anna Janušová at Economica Slovakia), education services have the highest sectoral share in sport-related GDP at 20%. This is followed by public administration and defence services and sport services, with shares of approx. 11% each. This suggests that in Slovakia, the public sector contributes by far the largest fraction to sport-related production and consumption. With a total sport-related GDP of 955.5 m Euros, education and other public services can jointly account for 298.5 m Euros. Regarding sport-related employment, the public sector takes a key role again as one quarter (25%) is attributable to education services. These are followed by sport services at 15% and accommodation and food at 13% of employment. The latter suggests that a sizeable share of sport-related employment is generated by services related to sport tourism (providing accommodation and food at sporting events, for individual sport tourists, etc.). Employees in the production of sport-textiles, apparel and related products make up 8% of sport employment, followed by public administration and defence services at 7%. Thus, cumulatively, the public sector has a very large economic impact on the sport sector in Slovakia, both in terms of GDP and employment.

3.26 Slovenia

In 2012, the Slovenian sport industry generated 609.4 m Euros of GDP, corresponding to 21.900 employees. This is equivalent to sizeable shares of 1.96% of total GDP and 2.43% of total employment in the Slovenian economy. The dominant sector in the sport industry is education services, generating 41% of sport-related GDP and 44% of sport employment, which corresponds to 1.06% of total employment in Slovenia. Retail of sport-related goods accounts for 9% of GDP and 12% of employment in the sport industry. Sport services generate 8% of sport-related GDP and 10% of sport employment. Compared to the other EU Member States, residential and social works services make a substantial contribution to the sport industry in Slovenia, generating 7% of industry GDP and 8% of employment. Wholesale trade of sport related goods contributes 6% to sport-GDP. Finally, sport tourism adds a further 6% to sport industry employment via accommodation and food services.

3.27 Spain

The Spanish sport economy (data provided by Plácido Rodriguez at the University of Oviedo and Júlia Bosch at the Univiersity of Pompeu Fabra) is clearly dominated by education (4,136.7 m Euros GDP, 76,000 employees). That sector alone contributes 0.40% to Spanish GDP and 0.44% to employment. It is followed by Culture and betting (CPA R90 to R92, 2,189.7 m Euros GDP, 29,900 employees), sport services (1,516.5 m Euros GDP, 30,600 employees), land transport (1,380.7 m Euros GDP and 26,600 employees), and accommodation and food services (941 m Euros GDP and 14,700 employment). They contain a share of 68% in sport-related GDP and employment. That refers to 0.98% and 1.02% of their economy-wide values. In total, sport-related GDP equals 14,984.0 m Euros (1.44% of total GDP), the 5th highest value in the EU, corresponding to 261,800 sport-related employees (1.50%) – ranking 6th in the EU.

3.28 Sweden

In Sweden, both GDP and employment related to sport are heavily centred on sport services and education services. Sport services is the largest sector, associated with 35% of sport-related GDP and 40% of sport-related employment. For education services, the shares are only marginally smaller at 31% and 37%, respectively. Of the 5,949.4 m Euros sport-related GDP, smaller shares of 7% each are attributable to publishing services (sport-related books, brochures, etc.) and the sport tourism-related accommodation and food services. A further 6% is attributable to the production of sport equipment. Accommodation and food services generates 7% of sport employment. The production

of sport-equipment and other related manufactured goods contribute 4% to sport-related employment, whilst in the publishing services the share is just 3%. Overall, employment in the Swedish sport industry is 109,100, corresponding to 2.43% of total employment. The top three sectors making the largest contributions to sport employment in Sweden (sport services, education services and accommodation and food services) have a cumulative share of 2.03% in total employment. In terms of GDP, the sport industry contributes 1.41% to the total GDP of the Swedish economy.

3.29 United Kingdom

The shares of sport-related GDP (see DCMS (2016)) and employment for the United Kingdom are 2.18% and 3.75% correspondingly. The distinctive characteristic of the UK sport industry is the very high level of employment generated by its sport activities included in the Eurostat sport definition (as reported by variable sprt-emp). The latter generated 395,100 jobs in 2012, the highest number in the EU, and considerably higher than the second ranked France at 277,400. At the core of this employment is the UK's network of sport clubs, partly supported by an 'army' of volunteers. Volunteering is deeply integrated into the core of the industry, supporting activities that, otherwise, would not have been able to survive in the market place. Overall the sport industry in the UK generated in 2012 1.1 million jobs, corresponding to 36.8 bn Euros. Sport related manufacturing is diversified among many activities such as sport equipment, bicycles, and sporting boats; moreover, there is a strong reliance on wholesale trade and retail. The UK, and especially Scotland, is attracting a lot of international sport tourism, with a large number of Golf resorts in operation. Sport betting is also very important in terms of generating GDP, corresponding to a third of all gambling in the country. Compared to the first edition of this report, we found that sport could be captured in more detailed codes; legal activities, for example, have become a major contributor, generating more than 1 million Euros in GDP. The SSA has become the key indicators for UK Government evaluation of sport initiatives and investment.

4 Technical Support

Initially, it was planned to give technical support to Belgium and Cyprus. However, it turned out that George Zeitountsian, the expert representing Cyprus during the ten years of constructing the national and the EU-wide SSAs, could do the calculations once again as part of the consortium. Thus, in the case of Cyprus, no technical support was needed.

Still, the consortium granted technical support to Belgium in their effort to create an SSA. The workshops were used for personal meetings with Olivier Courtin Attaché, in the Administration Générale du Sport, as the main contact person on the Belgian side. The Sport Administration of the Federation Wallonia-Brussels coordinated the project and facilitated intermediation. A trip to Brussels was undertaken on 14 September 2017 for another personal meeting in the Service Etudes, Recherches & Développements at Boulevard Léopold II, 44. Participants were Günther Grohall of the Consortium, Olivier Courtin, Rudi Acx, head of the General Statistics Department in the National Bank of Belgium, and Olivier Goddeeris, advisor at Statistics Belgium. Between meetings, communication took place mainly via e-mail.

Most of the data provided by the Belgian institutions were used during the construction of the SSA for the MR-IOT:S. Therefore, the Belgian part is much further refined than normal “proxy-SSAs” constructed for other MSs without SSA. Nonetheless, the SSA was refined even after calculations of the MR-IOT:S stopped, thus final results differ slightly from the Pan-European Account.

Data provided by Belgian institutions included:

- Wallonia:
    - Infrastructure subsidies to municipalities,
    - Infrastructure subsidies to sport clubs,
    - Subsidies for “Street Sport”,
    - Subsidies for CRAC (Centre Régional d'Aide aux Communes),
    - Grant to the circuit of Spa-Francorchamps,
    - Grant to the Hippodrome de Wallonie,
- East Belgian Subsidies in total,
- Dutch Brussels:
    - Renovation of Sporthal Koekelberg,
    - Sport in general,
- Brussels: Sport-related infrastructure of municipalities,

- Flanders:
    - Total budget of Bloso (Flemish Sport Agency, called Sport Vlaanderen)
    - Budget of Bloso headquarters,
    - Bloso infrastructure,
    - Bloso local infrastructure,
- Nike's EU-wide distribution centre in Laakdal.

Further information included a bridge table between the Supply and Use Tables and the CPA-categorisation. Additional data sources and information were found or provided by the consortium; for example, data on bicycle production (Coliped (2013)) and sales and trade margins (Statistik Austria).

The main result of the SSA for Belgium shows a sport-related GDP of 5.27 bn. Euros (1.36% of total GDP), and 70,934 sport-related jobs (1.58% of total employment). GVA (4.84 bn. Euros or 1.40%) has a slightly higher share as GDP contains taxes less subsidies on products which are very low in the case of the Nike centre in Laakdal. Once again it turns out that sport is an employment driver with every 63rd person employed in a company directly related to sport.

In terms of GVA, the Belgian sport economy is comparable to basic pharmaceuticals (4.4 bn. Euros), employment services (4.7 bn. Euros) and is much larger than agriculture and hunting (2.8 bn. Euros) and even insurance and pension funding (without compulsory social security) (3.9 bn. Euros). In terms of employment, sport is comparable to warehousing (72,000) and financial services (except insurance) (72,000). As before, it is substantially larger than agriculture and hunting (45,200), textiles and wearing apparel (27,100), basic metals (37,100), and postal and courier services (42,500). The sport-related sectors' GVA and employment values for Belgium are given in Table 9. Major sectors are education (school sport), warehousing (mainly, but not exclusively Nike in Laakdal), the core sector 93.1, retail, and wholesale. Public administration also accounts for a high number of employees (9.04% of the total), probably as a result of the existing parallel, federal structures. By comparison, employment in sport related public administration in Austria – a country with a strong federal structure too –is only 5.35% of total sport employment. The highest multiplier is calculated for construction (2.06) followed by agriculture and hunting services (1.96) and other professional, scientific and technical services and veterinary services (1.96). An SSA in the form of an IOT:S, including employment and the Leontief-inverse, was sent to the Belgian representatives.

Table 9: Sport-related GVA and employment in Belgium

Code	Sector name	GVA (m. Euros)	Employment (heads)
CPA_A01	Agriculture, hunting	6.3	101
CPA_C10-12	Food, beverages & tobacco products	4.7	70
CPA_C13-15	Textiles, wearing apparel, leather & related products	34.8	653
CPA_C18	Printing & recording services	1.8	29
CPA_C19	Coke & refined petroleum products	16.6	253
CPA_C21	Basic pharmaceutical products & pharmaceutical preparations	77.9	640
CPA_C22	Rubber & plastic products	41.8	467
CPA_C25	Fabricated metal products, except machinery & equipment	11.7	201
CPA_C26	Computer, electronic & optical products	4.9	83
CPA_C29	Motor vehicles, trailers & semi-trailers	31.2	700
CPA_C30	Other transport equipment	24.5	415
CPA_C31_32	Furniture & other manufactured goods	22.1	480
CPA_C33	Repair & installation services of machinery & equipment	7.4	25
CPA_F	Constructions & construction works	11.0	218
CPA_G45	Wholesale & retail trade & repair services of motor vehicles & motorcycles	69.6	1058
CPA_G46	Wholesale trade services, except motor vehicles & motorcycles	69.3	447
CPA_G47	Retail trade services, except of motor vehicles & motorcycles	286.1	7303
CPA_H49	Land transport services & transport services via pipelines	2.0	34
CPA_H50	Water transport services	3.0	10
CPA_H51	Air transport services	2.1	57
CPA_H52	Warehousing & support services for transportation	1156.6	800
CPA_I	Accommodation & food services	118.6	2917
CPA_J58	Publishing services	159.9	1340
CPA_J59_60	Motion picture, video & television programme production services, sound recording & music publishing	4.4	54
CPA_J62_63	Computer programming, consultancy & related services;	0.4	5
CPA_K64	Financial services, except insurance & pension funding	19.4	153
CPA_K65	Insurance, reinsurance & pension funding services, except compulsory social security	5.0	41
CPA_M69_70	Legal & accounting services; services of head offices;	49.6	191
CPA_M72	Scientific research & development services	2.7	10
CPA_M74_75	Other professional, scientific, technical & veterinary services	3.5	126
CPA_N77	Rental & leasing services	2.4	5
CPA_N78	Employment services	4.2	52
CPA_N79	Travel agency, tours & other reservation & related services	7.1	159
CPA_N80-82	Security & investigation services; services to buildings & landscape; office administrative, office support	4.5	114
CPA_O	Public administration & defence services; compulsory social security services	117.3	1929
CPA_P	Education services	1767.2	32720
CPA_Q86	Human health services	22.6	455
CPA_Q87_88	Residential care services; social work services	9.0	315
CPA_R90-92	Creative, arts, entertainment, library, archive, museum, other cultural services; gambling & betting services	25.4	527
CPA_R93_1	Sport Services, Core definition	611.7	15420
CPA_R93_2	Sporting services & amusement & recreation services	12.8	322
CPA_S95	Repair services of computers & personal & household goods	2.5	38

Source: Own calculations

5 Status Quo and Recommendations towards a European SSA

5.1 Status Quo

As was remarked a few times, there is uneven progress among the MSs in developing SSAs. Five groups can be formed:

1) MSs that produce SSAs continuously with adequate permanent experts and budget. There is no need for technical support. This group includes: Austria, Germany, Lithuania, the Netherlands, Portugal, Poland, and the UK.
2) MSs that have already produced at least one SSA previously, but no permanent experts or budget are available – technical support could be considered: Belgium, Cyprus.
3) MSs where currently, an SSA is being produced through the MS or external experts. Technical support could be considered. Note that this is a temporary group; MSs will be moved to either the 1st or 2nd group once an SSA is finalised: Luxembourg, Croatia.
4) MSs that are interested in producing an SSA, but no permanent experts or budget are available. Data availability has to be checked. A meeting and technical support could be considered. This group includes: Bulgaria, Czech Republic, Denmark, Estonia, Spain, Finland, Hungary, Italy, Romania, and Slovakia.
5) MSs that have shown no interest, with no experts or no budget available. A meeting and a check for data availability could be considered. This group includes: Greece, France, Ireland, Latvia, Malta, Sweden, and Slovenia.

Comments on groups and MSs:

a) Assignment of a MS to a group can change at any time, depending on the political situation and personal preferences of experts.
b) An SSA based on Supply and Use Tables is currently worked on. A national expert works in parallel on an IOT:S using the SSA's data.
c) Technical support to Belgium was given by the project team in the course of the project. It was decided that several national institutions will gather data and the project team will calculate the resulting SSA, most likely in the form of an IOT:S. The most current values were already used within the model.

5.2 Recommendations for EU Member States

Based on the above grouping, the following recommendations are made:

a) Support for group 2 can start in 2018. As Cyprus already has an SSA for 2012, support, if necessary, should be considered for a 2014 SSA.
b) Support for group 3 is either ongoing (Luxembourg) or will start soon (Croatia).
c) Members of group 3 will move to either group 2 (possibly to be the case for Belgium) or group 1 (possibly to be the case for Luxembourg and Croatia).
d) Meetings and operative support for group 4 are suggested to start in 2018. First contacts could already be arranged in 2017 as MSs are interested.
e) Meetings and support for group 5 should be prepared well. Aiming to do this in 2018 seems reasonable; paying attention to the political situation in the MSs (as an example elections) could be worthwhile. Reports of national or EU-wide SSAs may help convincing decision makers to create national SSAs there.
f) It may be helpful to produce, or put more weight, on a binding EU-document (for example the Council Conclusion of 2012) motivating the calculation of national SSAs.
g) In order to fully exploit the knowledge available EU-wide, support should be given by a group of experts covering all fields of SSA-prepration: data gathering (production as well as consumption), calculation, analysis, and policiy conclusions.

5.3 Further Recommendations

a) In order to asure continuity, MSs are to produce SSAs for 2014.
b) For data from 2015 and onwards, the new format CPA 2.1 should be used. If most MSs provide IOTs for this year, an update of the MR-IOT:S for this base year is advisable.
c) A contiunation of the Working Groups and Expert Groups is highly recommended to keep experts and representatives in touch with developments and facilitate exchange of views.
d) If no Expert Group is founded, forming a formalised, but lightweight group of SSA-experts is recommended. Such a group could meet once, or at most twice a year to exchange ideas, possibilities, and issues. To ensure participation, the meetings could be virtual using video-conference software and should last no more than a few hours at a time.
e) Produce regularly leaflets about progress, to motivate MSs to proceed with their own SSAs.

f) To supplement SSA results, collection of data on volunteering in sport is recommended. Such an analysis would depart from the framework of an SNA; however it is required as sport without volunteers is unthinkable in most countries. It should be noted that paid and unpaid work have different social impacts due to (zero) payment and the high personal subjective wellbeing of volunteers.

g) One of the major obstacles in calculating SSAs is data availability. On the production side, construction and operation of sport infrastructure plays a major role in many countries. However, even investment data is often hidden in national budgets or, even worse, subject to a regional or local decision making processes. In the last cases, it is practically impossible to fully trace the cost of all sport-related infrastructure. It is therefore recommended that MSs should set up data-bases on sport-related infrastructure. Such databases would contribute to both SSA-calculations and policy-making (e.g. to optimise the regional spread of sport infrastructure or to increase transparency of disposition of public money).

Annex A: Methodology

1 Input-Output Tables

Input-output tables describe an economy by focusing on detailed economic "sectors". They are symmetric, based on an industry by industry (NACE x NACE) or a product by product (CPA x CPA) classification. This is in contrast to supply and use tables (SUT, pl.: SUTs), which report the use of goods in industries (CPA x NACE). The European System of National and Regional Accounts (ESA) promotes *product by product* input-output tables, therefore almost all EU Member States provide such tables. They are collected by Eurostat[27] and were downloaded, for the purposes of this report, in June and July 2017.

The selection of the appropriate type of input-output tables (product by product vs. industry by industry) depends on the specific objective of economic analysis. Supply and use tables offer a flexible solution and are close to reality ("which goods are used by which sector"). Industry by industry input-output tables are closer to statistical sources and actual market transactions. Finally, product by product input-output tables (IOT, pl.: IOTs) are believed to be more homogenous in terms of cost structures and production activities.[28] IOTs have the general advantage of allowing further economic evaluation of indirect and induced effects[29]. These are the impacts generated within the supply network (indirect effect) and by the additional consumption originating from persons whose employment depends on direct and indirect demand (induced effect).

Depending on the origin of the goods, one can differentiate between three types: domestic, imported, and total (or domestic plus imported). Most often, one is interested in domestic IOTs, since they only report on domestically produced goods. Imports are aggregated to a single line. For the calculations, domestic IOTs were downloaded from Eurostat for all EU Member States with the exception of Luxembourg. In Luxembourg, only a total IOT (domestic plus imported) was available which was approximately translated into a domestic one (see section 1).

Figure 4 shows an exemplary domestic IOT with simple numbers in it. Please note that for the sake of simplicity we use "good" and "sector" synonymously from now on.

[27] Codes naio_10_cp1700 and naio_10_cp1750

[28] Eurostat (2008).

[29] Calculation of induced effects, however, requires numerous additional information which is not available for most EU Member States. Therefore they are left out in this study.

Figure 4: A simplified domestic input-output table.

		Good 1	Good 2	Good 3	Total	Private Consumption	Public Consumption	Final Consumption	Capital Formation, Valuables,	Exports	Total Final Use	Total Use
	Good 1	1	2	1	4	5	0	5	6	3	14	18
	Good 2	3	17	10	30	10	0	10	10	2	22	52
	Good 3	0	10	10	20	5	5	10	5	7	22	42
Total		4	29	21	**54**	20	5	**25**	21	**12**	**58**	**112**
Use of imported products		1	3	2	6	2	1	3	5	1	9	15
Taxes less subs. on products		1	-2	2	1	1	1	2	2	1	5	6
Total		6	30	25	61	23	7	30	28	14	72	133
	Employees' comp.	1	2	3	6							
	Cons. fixed capital	3	4	3	10							
	Oth. taxes on production	6	14	8	28							
	Operating surplus	2	2	3	7							
Gross Value Added		12	22	17	**51**							
Output		18	52	42	**112**							

Source: Own calculations

The core of the table, formed by the intersection of the sectors in the upper left part, is the intermediate goods matrix, shown in purple. It reveals the business-to-business relations within an economy. Rows report deliveries, whilst columns contain purchases. For example, sector 1 delivers one unit to itself, two units to sector 2 and one unit to sector 3 (upmost purple row). On the other hand, it receives one unit from itself, three units from sector 2 and nothing from sector 3 (left purple column).

Since goods are not the only cost element, additional rows are added below, containing imports, taxes less subsidies on products and gross value added (GVA) with all of its components (wages, consumption of fixed capital, other taxes on production, and surplus). Intermediate goods input plus imports plus taxes less subsidies plus GVA sum to each sector's output, which is the last row in Figure 4. This is the value of all goods of a sector produced in the economy. Output is often similar, but practically never identical, to turnover, as production and sales usually deviate from each other.

As goods are not just purchased by other companies, extra columns are placed to the right of the intermediate goods matrix. Here one finds, broadly speaking, private consumption, public consumption, gross capital formation, changes in valuables and inventories, as well as exports. They sum to total use. As all goods which are produced have to be consumed (or stored) somehow, the sum of each row (total use, orange part) equals the sum of the corresponding column (output, orange).

Please note that

- Private consumption uses a territorial definition: it equals the consumption of all private households within the economy. Foreign households consuming within the economy (tourists) are therefore counted as "private consumption" while domestic households consuming abroad are not.
- Imports can be exported directly again. In real IOTs the value is small, but usually strictly positive.
- Taxes on *products* are reported in the row below imports, while taxes on *production* are part of the GVA.
- Gross Domestic Product (GDP) equals GVA plus taxes less subsidies on products. In the example, we thus have a GDP of 51 + 6 = 57 (the 6 is the rightmost number of the row labelled "Taxes less subs. on products").
- A domestic IOT reports how much of each good is exported, but not, what they are used for. For example, we know that three, two, and seven units of goods 1, 2, and 3 respectively are exported, but their use in the destination country is unknown.[30]
- A domestic IOT reports what imports are used for, but not which goods are imported. E.g. three goods are imported for the production of good 2, but it is not stated how much of these imports is of good 1, 2, or 3.

1.1 Gross Value Added

Gross value added, often shortened to just "Value added", is among the main measures to capture economic activity. It is worth noting again that if taxes on products are added and respective subsidies subtracted, gross domestic product is calculated.

[30] Sometimes the destination or a group of countries (e.g. EU) are reported, but never the usage.

It is worth having a closer look at how GVA is embedded into the concept of economic activity. Economic activity of a company leads to its output (until recently called "production value") and revenue (or turnover) which differ mainly by changes in inventories (everything produced but not sold for revenue is stored in the inventory). Revenue is used to cover a multitude of costs and to produce surplus as shown in Figure 5. Costs fall into two parts: on the one hand intermediate goods (supplies, in the form of goods and services from other companies) are required which are transformed within a company and sold to its customers; on the other hand are the costs of this transformation. Consequently, two definitions of GVA can be derived: the first explains what is created (creation side) and the second explains what it is used for (use side).

First definition (creation side): GVA (orange in Figure 5) is the difference between turnover (purple) and costs for intermediate products including imports (dark grey) as well as taxes less subsidies on these products (light grey). Intermediate products are those goods and services which are transformed into other goods and services within a company. For example, carbon fibre, synthetic polymers, and paint are intermediate goods for producing tennis rackets, while the machine pressing everything into shape is an investment (investments are not transformed, they wear off over time which is called depreciation or consumption of investments or of fixed capital). If the intermediate goods are transformed into a racket, it is more useful and can thus be sold for more than the intermediate goods' price. This additional value is called GVA. Figure 5 replicates the numbers of Figure 4, so GVA again equals 51 Euros: 112 Euros turnover (labelled "Output (production value)") minus 61 Euros for intermediate products (54 Euros for domestic products, 6 Euros for imports, 1 Euros for taxes less subsidies on products – only the production side is shown). One can also see the composition of these 51 Euros GVA which directly leads to the second definition.

Second definition (use side): as can be seen in Figure 5, GVA also is the sum of salaries, wages, consumption of fixed capital, social contributions, taxes less subsidies on production, and surplus. Thus, GVA is used to pay the production factors: work (wages, salaries, social contributions), fixed capital (consumption of fixed capital), public services (production based taxes less subsidies), and ownership (surplus). Using this second definition, it becomes clear why output is finally better suited to describe GVA than turnover. Imagine the case that the company has produced goods worth 112 Euros, as shown in Figure 5, but only sold goods worth 61 Euros. The difference between turnover and costs for intermediate goods (including imports) would be 0 Euros, while in reality the company added quite a lot of value to those intermediate goods – it just did not sell them yet.

Looking at these concepts from a distance, one can also see the close relation to accounting.

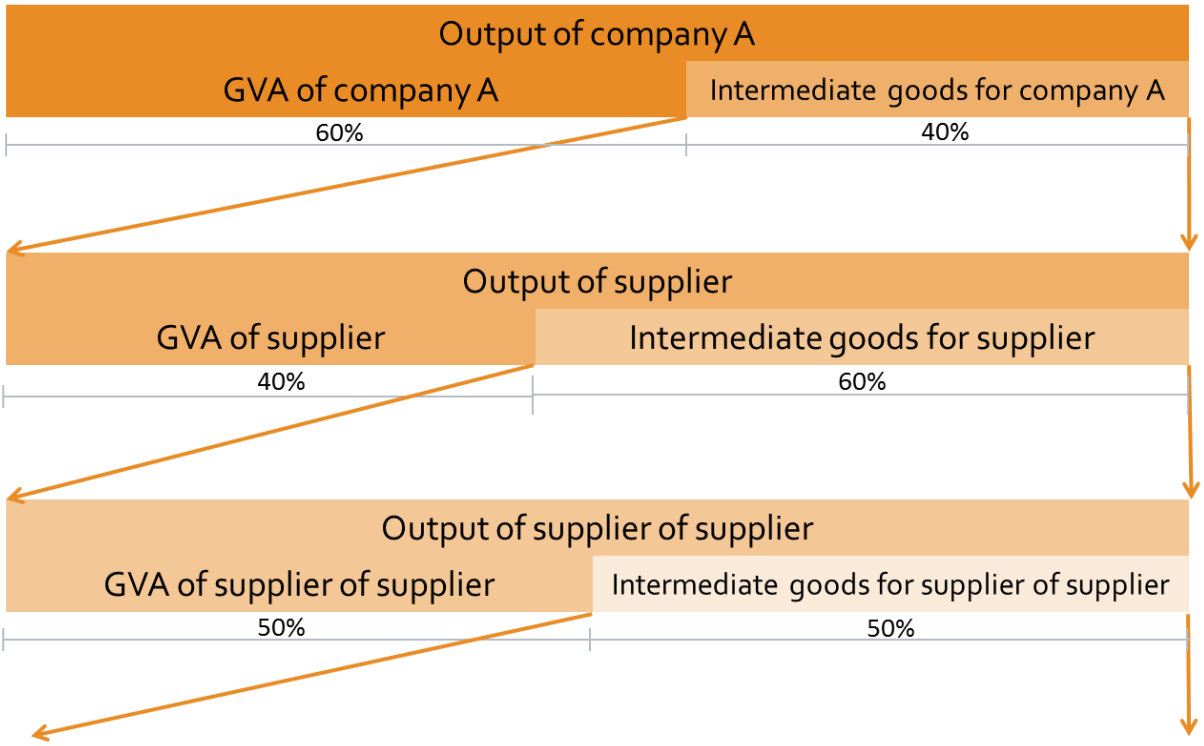
Figure 5: Structure of GVA (orange) as the difference between output (purple) and intermediate products (dark grey) including taxes less subsidies on products (light grey)

Source: SpEA, SIRC, 2017

High GVA grants high income to the four factors (employees, producers of fixed capital, public sector, entrepreneurs). Then, surpluses and wages increase consumption which in turn fosters the economy. The complete circulation of funds and resources is studied by the input-output analysis.

The shares of the four factors in GVA vary largely from sector to sector. As an example, the share of wages, salaries, and social contributions in Austrian real-estate services is a mere 8 % of GVA, while it reaches more than 91 % in residential care services.

Figure 6: Value added is purchased in the form of intermediate goods – different supply levels. Output and GVA produced at the same level share one colour



Source: based on Ambavis (2016).

To fully understand the concepts of output, intermediate goods, and GVA, it is necessary to understand the hierarchy of supply networks. The upmost part of Figure 6 shows the composition of company A's output. It consists of around 60% GVA and 40% intermediate goods. The latter are purchased from suppliers. Intermediate goods for company A are produced by these suppliers, so for them these are their outputs which in turn contain 40% GVA and 60% intermediate goods. Again, the suppliers of the suppliers need GVA and intermediate goods (roughly 50 % each). Note that:

- upmost output and GVA (dark orange) are direct effects, while everything taking place in the suppliers' GVA chain below is called indirect effects,
- this GVA chain is theoretically infinitely long,
- this GVA chain actually is not simply a chain but a GVA network, as almost every company has more than just a single supplier,
- this GVA network nearly certainly contains circles of different lengths,
- every product finally consists of 100% GVA, as explained below.

The last remark is visualised by aggregating all GVA as done in Figure 7. Direct GVA (dark orange) plus indirect GVA (lighter shades) sum to the directly stimulated company A's output. Therefore, it becomes clear that every product finally consists of pure GVA.

Figure 7: Value added is purchased in the form of intermediate goods

Source: based on Ambavis (2016).

Again, note that:

- the higher the share of direct GVA in a product (the dark part of the lower bar), the smaller the share of indirect GVA (the brighter parts of the lower bar) and vice versa,
- suppliers may be located abroad. After a number of supply-steps, GVA is "imported" from a foreign economy almost certainly. The more GVA is produced domestically, the better for the economy. Large economies (e.g. Germany) tend to have a higher share of domestic GVA than small economies (e.g. Cyprus, which has to import many products and thus GVA).

Until recently, one could differentiate between different pricing concepts, mainly "market prices", "producer prices", and "basic prices". They are no longer used in the European system of national and regional accounts (ESA 2010).[31]

1.2 Gross Domestic Product

Gross Domestic Product (GDP) is a commonly found measure for the production within an economy. It is closely related to GVA, but adds taxes less subsidies on products. Note that GVA contains "other taxes on production", which is different than "taxes on products" contained within GDP. Thus, GVA is purely production-related, while GDP also accounts for taxes and subsidies on intermediate products and on final use. The latter can be seen in Figure 4, where the row "Taxes less subs. on products" stretches over the whole width of the IOT, including positions such as private consumption and exports. Therefore, one can argue that GVA is closer to production and to single sectors, while GDP

[31] See http://ec.europa.eu/eurostat/statistics-explained/index.php/Glossary:Gross_value_added

gives a better view of the total economy. Also, GDP is much better documented in the media as it is the standard measure to report an economy's growth. However, since both taxes and subsidies on products directly depend on a country's political decisions, one could directly change GDP simply by changing these taxations and subsidies. It would even be possible to turn a shrinking GVA into a growing GDP, however in practice substantial issues of that kind are rare.

Coming back to last section's examples, GDP is calculated as 51 + 6 = 57 units from the IOT's values (see also Figure 8 below as a copy of Figure 4). In the structure shown in Figure 5, only the production side of GDP is shown, which is the sum of (orange) 51 units GVA plus (light grey) 1 unit taxes less subsidies.

Note that neither GDP nor GVA were meant to describe a country's well-being. Although this interpretation is often used, even among economists, both measures were developed to specify an economy's production only.

1.3 Input-Output Analysis

Returning to the nearly untraceable complexity of the GVA network and the appropriate methods to handle that kind of data, IOTs have to be introduced. Figure 8, a copy of Figure 4 for the sake of simplicity, shows the 3x3 intermediate goods matrix in the upper left corner (purple): in the columns one can read how much each sector purchased, while in the columns the deliveries to other sectors and final users are given.

Figure 8: A simplified domestic input-output table (copy of Figure 4)

		Good 1	Good 2	Good 3	Total	Private Consumption	Public Consumption	Final Consumption	Capital Formation, Valuables,	Exports	Total Final Use	Total Use
	Good 1	1	2	1	4	5	0	5	6	3	14	18
	Good 2	3	17	10	30	10	0	10	10	2	22	52
	Good 3	0	10	10	20	5	5	10	5	7	22	42
Total		4	29	21	**54**	20	5	**25**	21	**12**	**58**	**112**
Use of imported products		1	3	2	6	2	1	3	5	1	9	15
Taxes less subs. on products		1	-2	2	1	1	1	2	2	1	5	6
Total		6	30	25	61	23	7	30	28	14	72	133
Employees' comp.		1	2	3	6							
Cons. fixed capital		3	4	3	10							
Oth. taxes on production		6	14	8	28							
Operating surplus		2	2	3	7							
Gross Value Added		12	22	17	**51**							
Output		18	52	42	**112**							

Source: Own calculations

As everything which is produced has to be used in some way (even if it merely stored somewhere), these 18 units of output of sector 1 have to be booked in the same sector's row: it sold 1 unit to itself, 2 units to sector 2 and 1 unit to sector 3, therefore it produced a total of 4 intermediate goods. In addition to that it also produced 14 units for final use (5 private consumption, 6 capital formation and changes in storage and inventories, 3 exports). The 4 units of intermediate use plus final use of 14 units thus equal 18 units of total use which are equal to the output of good 1. Therefore, the numbers in the lowest row are equal to the numbers of the rightmost column.

Real IOTs feature a much larger number of sectors, usually around 65, and more detailed accounting structure.

Examples:

- As one can now read off the IOT, sector 1 does not need any direct supplies from sector 3. However, it purchases 3 units as supplies from sector 2 which buys 10 units from sector 3. Therefore, sector 3 also benefits – indirectly – if sector 1 grows.
- Several supply chain circles are clearly visible. For example, each sector purchases from itself (the diagonal from upper left to lower right, 1 – 17 – 10), which can be considered as "degenerate" or micro circles. But also sector 1 purchases from sector 2 (3 units) and the other way round (2 units). Thus direct "there-and-back-again" circles can be found by searching for non-zero values in the cells mirrored by the diagonal. An even longer one starts at sector 1, purchasing 3 units from sector 2, which purchases 10 units from sector 3, which again purchases 1 unit from sector 1.
- The IOT depicted in Figure 8 is a single-country IOT, which is the standard type. However, the IOT used for this project covers the EU-28, so there can be circles all over Europe, reaching from Ireland to Portugal, Cyprus, Finland, and back to Ireland again. More about such special multiregional IOTs follows further down.

Note that in Figure 7 company A has a high GVA (lower row, dark orange) in relation to output (upper row). Therefore, intermediate goods necessarily amount to a comparatively small part only. Put in other words: the effects which occur within company A (direct effects) are larger than the effects within the supply network (indirect effects).

In such sectors, direct effects are large while indirect are small. Therefore, the ratio of total effects (direct plus indirect) to direct effects is smaller in such sectors. This ratio is called "GVA multiplier". The higher the multiplier, the more the rest of the economy benefits from direct demand. Inversely, small multipliers indicate weak links to other sectors. However, multipliers can also be small if a lot of intermediary goods are imported since in such cases GVA is generated abroad. This concept leads to multiregional models, following a small glance at satellite accounts below.

2 Satellite Accounts and Thematic Input-Output Tables

2.1 General Aspects

Satellite accounts or satellite systems are extensions to the System of National Accounts (SNA) when the standard accounts (often sectors or goods) follow a categorisation different to the one needed (e.g. sport satellite accounts focus on sport, which is contained in many different sectors like sport journalism or production of sport shoes). It can also be the case that a sector is not sufficiently detailed like in the case of CPA 93 “sporting services and amusement and recreation services”. This sector is reported in many of Eurostat’s data bases, but as the name indicates sport is merged with amusement and recreation. One has to step deeper into the more detailed CPA 93.1 “sporting services” to obtain information on sport alone. Unfortunately, IOTs are provided on a 2-digit basis only, so the 3-digit information of CPA 93.1 has to be extracted from the original sector CPA 93. Doing so is comparatively easy from a theoretical point of view. One only has to insert a new row and a new column, fill that with the values of CPA 93.1 and subtract these values from the original row and column. Thus, the latter contain only purely non-sport data, while all the sport-related information is in the new row and column. Doing this for every sector containing sport-related data results in an IOT for sport (IOT:S, pl.: IOTs:S) as depicted in Figure 9. The new sport-related sectors are orange. They form the so called “satellite account” or in this case a “sport satellite account” (SSA, pl.: SSAs).

Figure 9: An IOT for sport showing the satellite in orange. Reduced values in original sectors are red.

			Good 1'	Good 2'	Good 3	Good 1S	Good 2S	Total	Private Consumption	Public Consumption	Final Consumption	Capital Formation, Valuables,	Exports	Total Final Use	Total Use
		Good 1'	**1**	**1**	1	**0**	**1**	4	**3**	0	**3**	**3**	**1**	**7**	**11**
		Good 2'	**1**	**11**	10	**1**	**2**	**25**	**6**	0	**6**	**7**	**1**	**14**	**39**
		Good 3	0	10	10	**0**	**0**	20	5	5	10	5	7	22	42
		Good 1S	**0**	**0**	**0**	**0**	**0**	**0**	**2**	**0**	**2**	**3**	**2**	**7**	**7**
		Good 2S	**0**	**3**	**0**	**1**	**1**	**5**	**4**	**0**	**4**	**3**	**1**	**8**	**13**
	Total		2	25	21	**2**	**4**	**54**	20	5	**25**	21	12	58	**112**
	Use of imported products		1	**2**	2	**0**	**1**	6							
	Taxes less subs. on products		1	**-3**	2	**0**	**1**	1							
Total			4	24	25	**2**	**6**	61							
	Employees' comp.		1	**1**	3	**0**	**1**	6							
	Cons. fixed capital		**2**	**2**	3	**1**	**2**	10							
	Oth. taxes on production		**3**	**11**	8	**3**	**3**	28							
	Operating surplus		**1**	**1**	3	**1**	**1**	7							
Gross Value Added			**7**	**15**	17	**5**	**7**	**51**							
Output			**11**	**39**	42	**7**	**13**	**112**							

Source: SpEA, 2017

Aggregate numbers are the same as in Figure 8, but sport content was moved from good 1 and good 2 (now good 1' and 2' to indicate loss of sport, corresponding reduced values are in red) to good 1S and good 2S respectively. Sector 3 remained unchanged. For example, originally sector 2 sold 17 units to itself. No there are 11 units from good 2' to 2', 2 units from 2' to 2S, 3 units from 2S to 2', and finally 1 unit from 2S to 2S, totalling again 17 units.

That IOT:S follows the same regulations and principles as any standard IOT. Its advantage is that sport-related economic activity is well defined in separate sectors which can be treated like any other sector. An IOT:S thus serves as a "zoom" into the details of sport within an economy.

2.2 Definition of Sport in the System of National Accounts

In theory, an IOT:S or an SSA can now be constructed. But there are several practical obstacles to be negotiated. The first is to differentiate between sport-related and non-sport goods in order to extract them from their original rows and columns.

Back in 2007, the EU Working Group on Sport & Economics reached consensus about the economic definition of sport, referred to as the "Vilnius definition of sport". The definition is an important building block for the construction of European IOTs:S, as it provides the basis for the international comparability of sport statistics.

The Vilnius definition discerns three layers: (i) the core definition (formerly called "statistical definition"), (ii) the narrow definition, and (iii) the broad definition.

Sport in the core definition is what is explicitly identified in the National Accounts. It includes the operation of sport and fitness facilities, sport clubs as well as other sport activities (e.g. sport leagues, racing stables, and mountain guides) and it is equivalent to the CPA 93.1 "sporting services".

Sport in the narrow definition includes the statistical definition and all goods and services which are necessary inputs for (doing) sport (i.e. to produce sport as an output). For example, manufacture, retail and wholesale of sporting goods and infrastructure.

Sport in the broad definition incorporates the narrow definition and all products and services which have a (direct or indirect) relation to any sport activity, but without being necessary to do sport (i.e. which draw upon sport as an input). This includes, sport tourism, betting, publications, media, and medical care related to sport. For example, one needs a football match in order to bet on it or to write about it, but betting or journalism are not necessary to play football.

The three levels are given as lists of specific product groups which define the scope of the SSA.

According to this 3-layer-concept the following rules apply to the definition of sport:

- Goods and services which are part of the statistical and narrow definitions of sport are also part of the broader definition of sport.
- Multipurpose infrastructure and multipurpose durable goods which are not part of the statistical definition of sport (NACE 93.1) are excluded, e.g. roads, cars, TV sets, play stations. Dedicated infrastructure is included.

- To avoid double counting and to ensure comprehensiveness, correspondence is established between the manufacturing sections and the trade/retailing sections.

Data are collected on the basis of a common agreement on which NACE and CPA categories to include. However, in order to take account of a country-specific sport landscape, additional CPA categories may exceptionally be included over and above the basic list agreed in the Vilnius definition.

In general, only final expenditure (incl. capital expenditure) is taken into account, and not intermediate expenditure. Reference to intermediate demand is only made if it constitutes sizeable input for professional sport. Similarly, industrial services are not considered unless they are sport-specific.

The Vilnius definition is characterised by small, but constant changes and adoptions. They mirror experiences by researchers using the definition, changes to the definition of CPA and NACE, as well as developments in real life (e.g. the advent of electric bicycles). Minutes of the last discussion round on the Vilnius definition, which took place in the course of this project, are presented in Annex C.

3 Multiregional Input Output Tables

In order to study international production relations in the same style as domestic IO-analysis does, it is necessary to link the single national (or more general “regional”) IOTs into one multiregional IOT (MR-IOT). Obviously, foreign trade serves as a link between the regions. However, usually only the aggregate import values are known, e.g. how much steel is shipped from country A to country B. What remains unknown is what the good is used for in country B. It could be an intermediate good to a company, it could be consumed by private households, it could be an investment, or it could even be exported again. Thus, calculating the links between the regions (i.e. EU Member States) is a complex task for which several methods were proposed. The three most important ones are:

- The Interregional Input-Output Model (IRIO) by Isard (Isard (1953));
- the Balanced Regional Model by Leontief (Leontief, 1963);
- the Multiregional Input-Output Model (MRIO) by Chenery and Moses (Moses, 1955);

The major advantage of Isard’s model is that it is able to cover the whole variety of effects of each sector and each region. This leads to a big disadvantage: the enormous effort of data collection.

The structure of the Leontief model corresponds to the that of Isard, but due to a difficult interpretation it is more complicated to apply. Its practical applicability is limited by the number of regions, sectors, and years to be used. As a result, it is hardly used anymore.

The approach by Chenery and Moses was chosen for the first calculation of the economic impact of sport in the EU. Formally the MRIO resembles the model of Isard, but it differs, with regard to the content, as it implies a very plausible stability hypothesis which eases calculations dramatically. In fact, without Isard's IRIO it is practically impossible to calculate a MRIO table under real-life conditions. The MRIO table suggested by Chenery and Moses is extendable to any number of regions with the complexity of the table being much lower than in Isard's model. The MRIO is set up in two steps: as a first step the intraregional tables are created (one table for each region, i.e. the national IOTs), in a second step the import and export flows are collected and inserted.

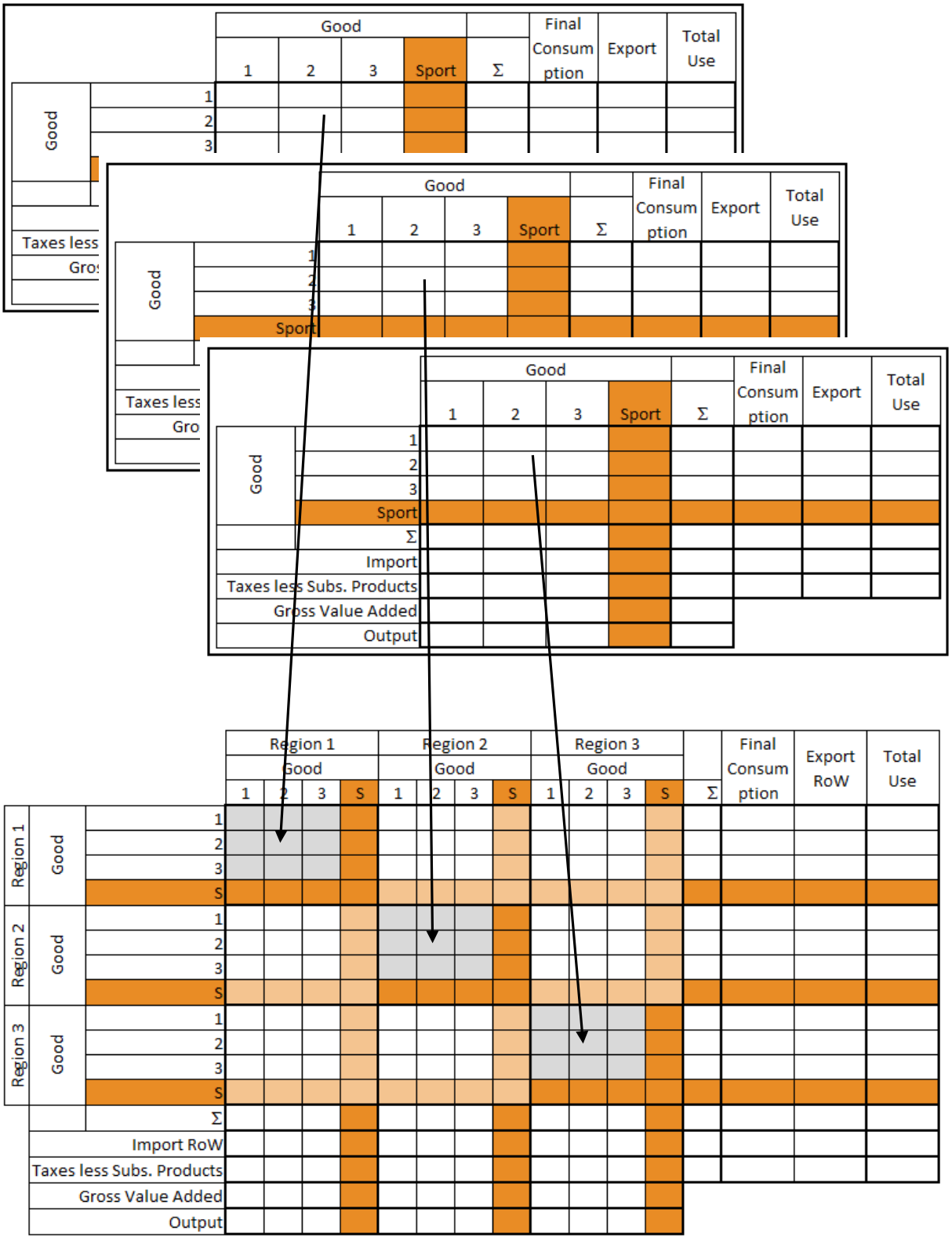
4 The Multiregional Input-Output Table for Sport

A hybrid approach was chosen for both the first study on the impact of sport on the EU's economy and the present update. Firstly, in order to analyse sport, IOTs:S were created for all 28 EU Member States. Then, in order to calculate EU-wide indirect effects, these 28 IOTs:S were merged into a multiregional IOT:S (MR-IOT:S, pl.: MR-IOTs:S). This became possible because an IOT:S can be treated in exactly the same manner as a normal IOT.

The principle model can be seen in Figure 10. In the upper section, one can see the national IOTs:S, with sport as separate sectors in orange (only a single sport-related sector is depicted for the sake of simplicity). The MR-IOT:S below consists of the national IOTs:S along the main diagonal from upper left to lower right. They are shaded a little darker than the rest. The remaining, light part of the intermediate goods matrix is foreign trade between the specific sectors of the various regions. GVA and final demand are placed below and to the right as usual.[32] The row and column designated "Import RoW" and "Export RoW" represent residual foreign trade with the rest of the world (i.e. model-extern).

[32] Final demand is more complex than in the domestic case though, as goods for final demand in one region may come from a different region. Thus, there actually is a final demand matrix for every combination of regions and sectors.

Figure 10: The layout of the MR-IOT:S



Source: SpEA, 2017

The calculated model features 107 sectors (65 non-sport, 45 sport-related) for all 28 EU Member States. The intermediate goods matrix thus has 28 x 107 = 2,996 rows and columns, making a total of 8,976,016 cells. Printing out the intermediate goods matrix thus needs 807,841,440 mm^2 or a little more than 53.93 m x 14.98 m = 807.81 m^2. In other words, one would need 12,925 sheets of A4 paper for a print out of the intermediate goods matrix alone.

5 Adaption of Methodology

For this update, a slightly different approach to that of Chenery and Moses was chosen. While the former study used total IOTs (i.e. domestically produced as well as imported goods are used in the intermediate good matrix and elsewhere), we developed the method further to allow for domestic IOTs. The advantage of domestic IOTs is that they report domestically produced goods only with imports showing up as aggregates in a separate single row (see Figure 8 to Figure 10). That is, we already know exactly the dark shaded parts of the MR-IOT:s with full precision. No assumptions have to be made for that intraregional part, which covers a little more than 83% of the total volume of intermediate goods. Only for the remaining 17% of interregional trade, a model has to be applied. Here we use the standard approach of Chenery and Moses which was adapted whenever needed in the spirit of the original authors (e.g. all goods are identical, no matter where they come from).

It is important to note that GVA, employment, output, and consumption remain unaffected by these changes. Thus, results of this update are fully comparable to that of the former study. The new model, however, is able to calculate EU-wide effect with enhanced precision.

6 Foreign Trade Methodology

The general procedure we followed in both goods and services was:

1. Construction of a matrix for international trade data.
2. Data collection on commodity trade.
3. Data collection on service trade.
4. Modelling sport related commodity trade.
5. Modelling sport related service trade.

To establish a dataset we go through the following steps:

1. In both goods and services, a selection has to take place for ‘reporters’, ‘partners’ and ‘codes’ that identify countries and economic categories.

2. Establish a relationship between SITC (or EBOPS) and CAP classifications. There is often adequate information for sport content, but if not, sport shares of trade must be decided through other countries and market intelligence. In other words, for each SITC code we need the percentages for sport and the associated CPA code (two digits). To do that we need to create a correspondence table based on online information.
3. Finally, we create a trade flow between the reporters and the partners within the constructed matrix of international trade.

The biggest problem of obtaining data for foreign trade in services was the database's incompleteness. If neither UN nor OECD data were provided, they had to be approximated. Often countries have trade flows for general categories which then are withheld in more detailed classifications. In such situations we either impose the trade flow structure of the nearest category available (that shows trade flows) or we obtain further information from the National Accounts of the countries in question if available.

Annex B: Data Sources and Issues

1 Data Sources

Data on national SSAs was provided by the experts compiling them. Six of them were published, namely Germany[33], Lithuania[34], the Netherlands[35], Poland[36], Portugal[37], and the United Kingdom[38]. These experts and the subcontractors which were asked to find data for specific countries were given simple data collector sheets which allowed a quick way of communicating information and easy transfer into the processing software. An example of an empty, basic sheet is given in Figure 11. If necessary, they received an additional row for CPA_R93_2 "sporting services and amusement and recreation services" and an additional column for gross capital formation.

A special request was sent to Eurostat for employment data in the Core sector R93.1 "sporting services". The data was delivered with certain data points marked as unreliable or confidential. They were used for calculating the model, but are not published in the report.

IOTs were downloaded from Eurostat. The variables were naio_10_cp1700, naio_10_cp1750.

GDP and main aggregates were downloaded from Eurostat too, via variable nama_10_gdp.

Prodcom data is extremely detailed and a major source of information. It can be accessed at Eurostat via http://ec.europa.eu/eurostat/web/prodcom/data/excel-files-nace-rev.2

Data on physical education was derived from European Commission/EACEA/Eurydice (2013), chapter 3.2 and 3.3.

[33] Ahlert G., an der Heiden I. (2015)

[34] Statistics Lithuania (2016)

[35] CBS (2015)

[36] Liberda, Tomaszewicz, Świeczewska, and Tręska. (2015)

[37] Statistics Portugal (2016)

[38] DCMS (2016)

Figure 11: The data collector for national sport-related data

Country:	please insert						
Year:	2012						
	Gross Value Added	Production Value	Employment	Private Expenditure	Public Expenditure	Import	Export
	Mio. Euro	Mio. Euro	Heads (NA	Mio. Euro	Mio. Euro	Mio. Euro	Mio. Euro
CPA_A01 - Products of agriculture,							
CPA_C10-12 - Food, beverages							
CPA_C13-15 - Textiles, wearing							
CPA_C18 - Printing and recording							
CPA_C19 - Coke and refined							
CPA_C21 - Basic pharmaceutical							
CPA_C22 - Rubber and plastic							
CPA_C25 - Fabricated metal							
CPA_C26 - Computer, electronic							
CPA_C29 - Motor vehicles, trailers							
CPA_C30 - Other transport							
CPA_C31_32 - Furniture and other							
CPA_C33 - Repair and installation							
CPA_F - Constructions and							
CPA_G45 - Wholesale and retail							
CPA_G46 - Wholesale trade							
CPA_G47 - Retail trade services,							
CPA_H49 - Land transport services							
CPA_H50 - Water transport							
CPA_H51 - Air transport services							
CPA_H52 - Warehousing and							
CPA_I - Accommodation and food							
CPA_J58 - Publishing services							
CPA_J59_60 - Motion picture, video							
CPA_J62_63 - Computer							
CPA_K64 - Financial services,							
CPA_K65 - Insurance, reinsurance							
CPA_M69_70 - Legal and							
CPA_M72 - Scientific research and							
CPA_M74_75 - Other professional,							
CPA_N77 - Rental and leasing							
CPA_N78 - Employment services							
CPA_N79 - Travel agency, tour							
CPA_N80-82 - Security and							
CPA_O - Public administration and							
CPA_P - Education services							
CPA_Q86 - Human health services							
CPA_Q87_88 - Residential care							
CPA_R90-92 - Creative, arts,							
CPA_R93.1 - Sporting services							
CPA_S95 - Repair services of							
Comments & additional information:							

Source: SpEA, 2017

2 Foreign Trade Data

As in the previous report, a decision was taken early on to investigate all trade primarily through international datasets. This is partly for reasons of consistency and partly in order to negotiate the problem of not having, usually, adequate information for the international trade in services. Trade in commodities is much more reliable with detailed data collected for tax purposes. In both cases information can be collected from the OECD and the UN international trade databases.

In the case of commodities all data collection was done through the UN dataset. There are two UN website tools that deal with such data. We found it much easier to use the older version of the dataset[39] ('legacy') as it offers the option of mass selection of countries and codes under its 'express selection' facility. The dataset contains annual bilateral merchandise trade (imports/exports) for all available countries for up to 5 digit SITC (Standard International Trade Classification), up to 6 digit HS (Harmonised Commodity Description and Coding Systems) and BEC (Broad Economic Categories). In this research we found that the SITC classification offered the best way to 'connect' with the NACE system in the Accounts. The SITC system classifies the production of materials, the processing stage, uses of products, the importance of goods in world trade, and technological changes. Although many categories are explicitly identified, in some cases further breakdown of information is required to arrive to the sport-related part.

Trade in services was much more complex, due to data gaps and limited information offered by both UN and OECD datasets. To build a complete picture both aforementioned datasets had to be used. In the case of the UN, the legacy website is no longer operational; we had to use a contemporary UN 'comtrade' website[40], offering limited data collection possibilities in terms of the number of countries and codes that could be selected at a time. In this database, data were collected under the EBOPS 2002 classification codes (Extended Balance of Payments Services classification).

In addition to UN-service data, OECD service data[41] was used. This turned out to be useful, as for some reason these two data sets are not equally loaded with information. Not all countries were reported in both datasets. In the OECD dataset the system of classification was EBOPS 2010.

[39] http://comtrade.un.org/db/dqBasicQueryResults.aspx?px=S3&cc=00151&y=2005

[40] https://comtrade.un.org/data/

[41] http://stats.oecd.org/viewhtml.aspx?datasetcode=TISP_EBOPS2010&lang=en

3 Issues

3.1 General Consistency

Numerous data is required for the calculation of national SSAs: an IOT, sport-related data on production, Gross value added, employment, final consumption, as well as aggregated foreign trade. Under normal circumstances, these data contradict each other from time to time. An easy example is the frequently used equation imports + production = exports + consumption. If all four data points are found for one sector, it is more than likely that the two sides do not fit. Therefore, the researcher has to make a decision where and how to operate in order to ensure consistency. There is no standard procedure for that and the project team carefully weighted the pros and cons of each possibility in every single case. Usually it was assumed that domestic data is more reliable than foreign trade data.

3.2 Foreign Trade of Services

Services usually have to be consumed where they are created. That is especially true for sectors like accommodation, where the service is bound to a certain geographical space. Discussions can arise if the service is consumed by a foreigner paying with foreign money. However, it was decided that final consumption by a household is considered domestic if it takes place within the borders. Thus, a foreign private person staying in a hotel is considered a private consumer in the domestic IOT.

However, even in that case exports are possible if the consumer is not a private person, but a foreign company which books the hotel room for a business trip. In this case, the stay would be an export of intermediate goods to that company.[42] As this is a possibility for every service, one should find non-zero values in most cases.

However, this is not always the case. As an example, the French IOT reports strict zeros for accommodation and food services, while the Austrian IOT reports 2.2 bn Euros or nearly 10% of its production value. While it is still possible that such zero-exports simply do occur in certain MSs, it is considered unlikely by the project team.

Nevertheless, whilst operating within the values of an SSA does not alter the underlying IOT, increasing exports from zero to a strictly positive value is a major intervention. Therefore, the project team decided not to do such changes.

[42] Personal information from Statistik Austria.

3.3 Problems within the IOT

A problem which was little anticipated was finding errors within an IOT. Small rounding mistakes can be found in most IOTs and are not very upsetting. More problematic are completely missing sectors which certainly exist in reality. Another example is the existence of single values which do not add to the sum given in some IOTs. Such issues can be found in the tables of many countries. In the most severe cases, discrepancies are so large, that GDP derived from the IOT and GDP published via Eurostat differ by one third.

The task remains to deal with this issue. The project team decided to adopt a top-down approach. It was assumed that numbers representing aggregate are more reliable than detailed sectors. While keeping the ratios between the disaggregated values constant, they were scaled in such a way that their new sum meets the aggregate value. Thus, a fully functional and consistent IOT could be derived for each MS.

3.4 Country-wise Foreign Trade

Apart from national IOTs and national SSAs, country-wise foreign trade is the third big data block which has to fit into the model. While national SSAs “only” have to deal with aggregated imports and exports, the MR-IOT:S requires country-wise data. That is, one has to know how many goods and services from each sector of each MS go to other sectors of other MSs. The sum over all export-partners has to be equal to the aggregate export value given in the IOT. The same holds for imports. Even more complicated, most sectors are split in their sport-related and non-sport part. The equation has to hold for both.

Foreign trade data often is a source of problems since data-collection by the authorities is incomplete. Thus, exports of country A to country B should appear as country B’s imports from country A – but often are not. Such country-wise differences can be substantial.

Although many of the sums were comparatively close to the numbers in the IOT, even the smallest difference had to be eliminated. The same reasoning as above was applied here: the IOTs were used as target values and country-wise foreign trade was scaled in such a way that its sum matched the IOTs.

3.5 Issues concerning Foreign Trade Data

Some issues that are specific to the Foreign trade data are discussed below. These relate to the definitions of exports and imports, the issue of re-exports and the classification system of services. These are issues in addition to problems of data availability discussed previously.

As the different classification systems show, the definitions of exports and imports, as reported by the UN are not equivalent to each other. Imports are generally reported on the Cost, Insurance and Freight (CIF) basis, while exports are reported on the Free on Board basis (FOB). Thus, export values represent the good's price only (plus transport to the ship/truck) while import values include substantial additional costs. To negotiate this problem, we collected export figures, which correspond to the National Accounts, and then we applied the Chenery/Moses procedure to distribute imports within each country. There is the theoretical drawback that countries have a bigger incentive for registering imported goods as they might be subject to customs duty while exports might leave the country unnoticed. This, however, is unlikely to be a problem for the EU.

The exports we considered can be divided into exports of domestic goods and exports of foreign goods. The latter are generally referred to as re-exports, which implies exporting goods in the same state as previously imported. This most often happens when an exported good might be defective, the importer might have defaulted on payments or cancelled the order, the authorities might have imposed an import barrier, and finally demand or prices in the country of origin might have made it worthwhile to bring the goods back. We have collected more data than required for the reporting stage, so that modelling of sport-related trade can be meaningful and accurate.

Another issue, especially in services, was the compatibility of the satellite accounts of individual states with the international data generated through this exercise. It is generally expected that equivalent figures would be generated through both processes. However, unlike the commodities dataset, the service databases do not have a one to one correspondence to the National Accounts categories. In other words, in the case of services we do not have an alignment of NACE with the international standards. Hence, on the outset, as it stands the exercise becomes much more complex. There is no way to navigate with certainty from the EBOPS classification to the NACE one. However, comparing the EBOPS classification directly to the National Input Output tables can bring much insight about the distribution of trade in sport services. Hence, a 'triangulation' of EBOPS, NACE and the National Input-Output Accounts is required to negotiate this problem.

Annex C: Minutes of Meetings

1 Minutes of the Kick-off Meeting

Telephone conference

Time: 25 January 2017

Attending persons in alphabetical order: **Roland Farkas** (DG EAC), **Günther Grohall** (SpEA), **Christian Helmenstein** (SpEA), **Themis Kokolakakis** (SIRC)

15.00 Welcome.

15.05 Technical aspects:

a) Discussion on e-bikes. Industry is developing, but not very sizable yet. The Vilnius definition must be updated.
b) Which year is better – 2010 or 2012? For the first year, practically every MS provided an IOT to Eurostat, less so for 2012. However, for latter year, Supply and Use Tables can be used to calculate IOTs. Also, 2012 is more recent and during the following weeks, additional IOTs could be sent to Eurostat. A strong general preference for 2012 was noted.

15.20 On the report:

a) DG EAC prefers GDP instead of GVA as the reporting measure. It is easier to communicate to the public as most economy-related publications in the media use GDP. Although it is easier to calculate GVA precisely, the difference between the two measures is not large when the sport-related shares in total GVA or GDP are used.
b) The direct, broad Vilnius definition is to be used for reporting.
c) There has to be an executive summary of two to three pages, the publication itself should be short, 15 to 20 pages, with the methodology in the annex. Also, all other results, as an example the core or narrow definition, have to be in the annex.

15.30 Further procedure:

a) The first workshop will take place as soon as possible as the Vilnius definition is necessary for the project
b) The second workshop will be in October.

c) Recommendations for the future of SSAs shall be derived.

d) Technical support will be granted to interested MSs. Belgium is very advanced in talks with DG EAC. It must be investigated which other MSs could be interested in constructing national SSAs.

15.55 End of kick-off meeting.

2 Minutes of the Workshop on the Vilnius Definition

Place: Rue Joseph II 70, 1040 Brussels – DG EAC building

Time: 28 February 2017

Attending persons in alphabetical order:

Richard Anner (Sport Ministry of Luxembourg), **Mario Baptista** (National Statistics Office Portugal), **Alice Bergonzoni** (Sport Ministry of France), **Charles Bourgeois** (Administration générale du Sport, Belgium), **Günther Grohall** (SportsEconAustria), **Andries Kuipers** (National Statistics Office Netherlands), **Vilma Cingiene** (Mykolo Romerio University, Lithuania), **Olivier Courtin** (Administration générale du Sport, Belgium), **Roland Farkas** (DG EAC), **Themis Kokolakakis** (Sheffield Hallam University, United Kingdom), **Tsvetelina Marinova** (Eurostat), **Simon Miller** (Department for Culture, Media and Sport, UK), **George Zeitountsian** (expert representing Cyprus).

10.30 Introductory Tour de Table

10.45 Start of the Morning Session

a) Sport in Elementary schools: sport in elementary schools dropped out of the Vilnius definition of Sport (VD) during its update to CPA 2008, most likely due to a copy-paste mistake. During the mail exchange before that meeting it was decided to bring it back into the VD by simply inserting the relevant entries. However, details turned out to be more complicated and had to be clarified. It was decided to keep “P 85.31.11” and “P 85.31.12” as suggested, to add “P 85.10.10”, to move “P 85.53.11” and “P 85.53.12” to elementary schools, and to add “P 85.20.11”, “P 85.20.12”, “P 85.32.13” and “P 85.32.14” to upper secondary schools.

   It was also clarified that education of trainers belongs to “P 85.60.10”.

b) E-bikes (also called “pedelecs”): after initial mail exchanges about the proper category of e-bikes (“C 30.91.13 motorcycles n.e.c.; side-cars”), the question arose whether e-bikes should be treated as sport-related. There were exhaustive discussions about this topic. It was argued that e-biking is not physically challenging (at least not when riding modern e-bikes

which are relatively powerful) and has strong recreational characteristics. On the other hand, physical effort is not necessarily needed for the definition of sport. And since there are already some competitive events and even e-mountain bikes using the engine to go up-hill while riding the bike down in a non-casual style, e-bikes can also be regarded as sport-related.

It was decided to use a similar reasoning as with sport-shoes: the decision whether and how much sport association can be attributed to e-bikes is left to the national experts.

c) A company survey in the UK showed that many sport associations were classified within "S 94 Services furnished by membership organisations". For some reason, the English and the German descriptions of "S 94" differ as the German includes the text "ohne Sozialwesen und Sport", so "without welfare and sport". Discussions and searching the detailed descriptions of CPA showed that sport associations have to be classified as "S 93.19.13 […] regulating bodies".

In case wrongly classified associations can be identified[43], they have to be booked properly for the duration of the projects (i.e. this correction has to be done even if the classifying institution does not do it).

d) Several national experts did not know where to classify sport ministries and other public administrative bodies. Again, detailed searching in the definitions of CPA 2008 was done. It revealed that sport ministries are to be classified as "O 84.12 administrative services for the regulation of health care, education, cultural services and other social services, excluding social security". However, there is an important exception: if these bodies administer sport facilities, their services are to be classified as "O 93.11 Sports facility operation services".

e) The UK company survey mentioned above also revealed that many sport-related companies are classified in wrong sectors. At least several of them have sport as their main purpose, like sport-betting or fitness centres. It was agreed that even if the classifying institution does not correct such mistakes, it has to be done internally for the research projects.

13.15-14.00 Lunch

14.00-16.30 Afternoon session

f) During exchanges before the workshop, the question for the necessity to update the VD from CPA 2008 to CPA 2.1 was raised. Eurostat commented that CPA 2.1 will be used for data from 2015 onwards. As most recent data is for 2013, an update will be necessary in the mid-

[43] Several countries do not provide the necessary data for such surveys. For example, in Austria there are some semi-public data bases of companies and their CPA-codes, but no names or descriptions of the companies are given. Thus the plausibility of the CPA-codes cannot be checked.

future. Only a few categories in the VD are likely to be affected.

g) Eurostat provides data on sport-related employment in a slightly different way than the VD. While the Statistical Definition of the VD defines sport as everything within “O 93.1”, Eurostat crosses “O 93.1” with ISCO “342 Sports and Fitness Workers”. Thus, it adds sport and fitness workers of all other sectors to “O 93.1”. Therefore, the two definitions are not compatible, as the VD numbers have to be smaller than the Eurostat numbers. Eurostat was asked to provide the full employment of “O 93.1” in order to support the work of sport economists as much as possible.

h) As Eurostat called its definition of sport “statistical definition”, it was decided to rename our original "statistical definition" into “core definition”.

i) Until now, Eurostat has published aggregated estimates of expenditure of sport goods and services and recreational goods and services. This gives only an upper limit for sport expenditure. However, Eurostat replied that future COICOP will go to four digits instead of the current three digits, so it will be possible to separate the two topics.

16.30-16.45 Conclusion, next steps

j. It was decided that a VD in terms of NACE, CN and PRODCOM would be a good idea. Given the natural limitations of these categorizations (e.g. PRODCOM does not feature services), such translations should be undertaken.
k. An unofficial update of the VD will be distributed among the participants of the workshop. After they checked for remaining mistakes, an official version will be handed out.

SportsEconAustria will provide a CPA 2.1 version of the new VD in the mid-future.

3 Minutes of the Workshop for Interested MSs and on the Results of the MR-IOT:S

Place: Videoconference

Time: 13 October 2017

Attending persons in alphabetical order:

Gerd Ahlert (GWS, Germany), **Mario Baptista** (National Statistics Office Portugal), **Milan Dedera** (Czech Statistical Office), **Günther Grohall** (SportsEconAustria), **Anna Janusova** (Economica Slovakia), **Vilma Cingiene** (Mykolo Romerio University, Lithuania), **Roland Farkas** (DG EAC), **Themis Kokolakakis** (Sheffield Hallam University, United Kingdom), **Vassos Koutsioundas** (Cypus Sports Organisation), **Paulina Ludorf** (Central Statistical Office, Poland), **Jonnie Nordensky** (Svenks Idrott), **Fernando Tenreiro** (National Statistics Office Portugal), **George Zeitountsian** (expert representing Cyprus).

10.00 Introduction of participants.

10.10-11.00 Presentation of results.

11.00-11.40 Discussion of results:

a) George Zeitountsian: employment should consider volunteering. Major/Mega sport events and construction are important issues to consider as they only occur seldom, but have a major impact.
b) Vassos Koutsioundas: common methodology for volunteering.
c) Günther Grohall: construction takes a long time, often several years. Thus, the impact is much longer than a sport event.
d) Themis Kokolakakis: side effects of sport have to be considered as there is a huge benefit around sport (as examples mental health, social development). A large part of volunteering is on sport. Sport volunteers happily contribute, but do not show up in the SNA. Also take into account the effect on real estate.
e) Gerd Ahlert: He has considered three major sport events, but their impact on annual GDP is tiny. Therefore analysis is better done on a national level. Volunteering is not paid; thus it has a different meaning for the society than paid jobs. MR-IOT:S is mainly supply-side based. Many data are unavailable. Often, even the companies involved do not know about their products' sport-relevance. This is also true for foreign trade and proxy-accounts.
f) Günther Grohall: major sport events are small compared to GDP, but are substantial when compared to sport-relevant GDP. Eurostat will provide data on sport and recreation within a few years. Consumption data on some sport items are already available.
g) Themis Kokolakakis: consumer spending on sport is easily available in the United Kingdom. Foreign trade statistics on goods is very detailed.
h) George Zeitountsian: do not include volunteers in the basic SSA. Information on volunteers should supplement SSAs. Consumption data indeed are very detailed. The trade survey is available.
i) Roland Farkas: use volunteering data to supplement SSA results. Health benefits are more and more important. The presentation of consumption data might change in the Household Budget Survey and could become more detailed.
j) Themis Kokolakakis: the volunteering sector is well researched in the United Kingdom; sport volunteering data are available through surveys (e.g. Active Lives Survey).

k) Günther Grohall: at least indicative values for volunteering only. Use lowest possible wage for evaluating the benefits volunteering.
l) Roland Farkas: EU-study on volunteering in 2010: “Volunteering in the European Union”. Up to 2% of GDP in several countries.
m) Themis Kokolakakis: there is a study on volunteering in Austria from around ten years ago.

11.40 Roland Farkas reviewed the study’s necessities from the EU’s point of view and commented on the leaflet. He also raised the question whether the indicators GDP, broad definition, direct effects are appropriate for everyone.

11.50 George Zeitountsian raised the question whether a comparison between the results of 2005 and 2012 in the leaflet would be useful. Günther Grohall pointed out the problems associated with different measures (GVA against GDP, different Vilnius definitions).

11.55 Everyone was asked whether they had any questions, but no major issues were raised.

12.00 General agreement to limit the 2005 – 2012 comparison on the four MSs which had national SSAs in 2005. Roland Farkas mentioned that Eurostat is keen to talk about the definition of sport as there is a similar project running in parallel with discussions between Eurostat and DGs about the sport-related percentages of some products and more issues. There will be no more Expert Groups, but a Cluster Meetings on SSAs and a conference by the Austrian Presidency about the economic impact of sport and innovation. Further there is a Council Conclusion, from 2012, in support of SSAs. He also gave an outlook on oncoming EU-events relevant to sport and SSAs, as well as on planned technical support for MSs which wish to calculate SSAs, but lack the expertise.

12.20 End of the workshop.

Annex D: National Data Sheets

What follows are the national data sheets of every MS, reporting details on sectoral results. Sector-specific multipliers show how much total output is needed from an economy, if on unit of output is to be created by that sector. The difference between domestic and EU-wide multipliers relate to the size of the respective economies. Since the EU is a much larger economy than even the strongest national economy, the respective multipliers are higher. If, for example, a German producer of tennis rackets buys aluminium from within Germany, it increases the multiplier; if, however, it has to be imported from another MS, only the EU-wide multiplier is increased. The multiplier, thus, is an indicator of how much the economy is affected by the sector's supply network.

Values labelled as unreliable or confidential by Eurostat are marked with an "a".

National Data Sheet
Austria

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	0.97 bn €	0.31%
Narrow Definition	6.39 bn €	2.02%
Broad Definition	13.07 bn €	4.12%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	17,963	0.45%
Narrow Definition	112,368	2.80%
Broad Definition	226,129	5.63%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	72.99	5,193	1.76	2.12
C10-12	Food, beverages and tobacco products	21.84	377	1.84	2.36
C13-15	Textiles, wearing apparel, leather and related products	46.77	837	1.48	2.19
C18	Printing and recording services	17.92	236	1.50	2.20
C19	Coke and refined petroleum products	5.74	11	1.28	1.68
C21	Basic pharmaceutical products and pharmaceutical	19.62	97	1.45	2.07
C22	Rubber and plastic products	0.36	4	1.46	1.64
C25	Fabricated metal products, except machinery & equipment	5.28	74	1.70	2.27
C26	Computer, electronic and optical products	0.54	4	1.37	1.51
C29	Motor vehicles, trailers and semi-trailers	195.06	1,430	1.06	1.14
C30	Other transport equipment	81.77	331	2.37	3.87
C31_32	Furniture and other manufactured goods	245.14	4,520	1.49	2.24
C33	Repair and installation services of machinery & equipment	28.42	302	1.51	2.01
F	Constructions and construction works	348.92	4,616	1.82	2.17
G45	Wholesale and retail trade and repair services of motor	109.41	1,731	1.56	1.90
G46	Wholesale trade services, except of motor vehicles and	127.89	1,163	1.48	1.77
G47	Retail trade services, except motor vehicles & motorcycles	1,725.68	38,363	1.52	1.70
H49	Land transport services and transport services via pipelines	972.35	19,185	1.65	1.92
H50	Water transport services	0.19	3	1.92	2.31
H51	Air transport services	0.01	0	1.86	2.05
H52	Warehousing and support services for transportation	3.11	36	1.55	1.73
I	Accommodation and food services	3,717.93	65,475	1.48	1.71
J58	Publishing services	81.64	826	1.93	2.20
J59_60	Motion picture, video and television programme production	61.95	664	1.68	2.12
J62_63	Computer programming, consultancy and related services;	18.56	231	1.62	1.90
K64	Financial services, except insurance and pension funding	27.47	244	1.59	1.83
K65	Insurance, reinsurance and pension funding services, except	163.33	1,058	1.73	2.05
M69_70	Legal and accounting services; services of head offices;	242.90	3,333	1.66	1.93
M72	Scientific research and development services	11.46	218	1.31	1.51
M74_75	Other professional, scientific and technical services and	20.86	412	1.68	1.92
N77	Rental and leasing services	182.17	475	1.42	1.60
N78	Employment services	38.74	1,025	1.16	1.21
N79	Travel agency, tour operator and other reservation services	13.81	256	1.57	2.38
N80-82	Security and investigation services; services to buildings	46.61	1,138	1.52	1.70
O	Public administration and defence services; compulsory	361.39	4,662	1.42	1.56
P	Education services	1,605.30	24,732	1.18	1.26
Q86	Human health services	1,361.96	22,959	1.34	1.54
Q87_88	Residential care services; social work services without	12.94	405	1.40	1.58
R90-92	Creative, arts, entertainment, library, archive, museum,	58.41	890	1.37	1.53
R93_1	Sport services	974.48	17,963	1.52	1.70
R93_2	Sporting services and amusement and recreation services	15.80	292	1.52	1.70
S95	Repair services of computers and personal and household	19.38	355	1.40	1.74

National Data Sheet
Belgium

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	0.71 bn €	0.18%
Narrow Definition	3.73 bn €	0.96%
Broad Definition	4.49 bn €	1.16%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	15,420	0.34%
Narrow Definition	62,183	1.39%
Broad Definition	71,440	1.59%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	7.59	101	1.97	2.56
C10-12	Food, beverages and tobacco products	6.28	70	1.88	2.78
C13-15	Textiles, wearing apparel, leather and related products	42.74	653	1.65	2.43
C18	Printing and recording services	1.88	29	1.65	2.26
C19	Coke and refined petroleum products	34.03	253	1.49	3.13
C21	Basic pharmaceutical products and pharmaceutical	83.88	640	1.44	1.92
C22	Rubber and plastic products	46.07	467	1.46	2.28
C25	Fabricated metal products, except machinery & equipment	12.81	201	1.66	2.36
C26	Computer, electronic and optical products	5.17	83	1.50	2.31
C29	Motor vehicles, trailers and semi-trailers	37.08	700	1.35	2.98
C30	Other transport equipment	10.51	183	1.61	2.25
C31_32	Furniture and other manufactured goods	26.00	480	1.61	2.38
C33	Repair and installation services of machinery & equipment	7.57	25	1.53	1.98
F	Constructions and construction works	14.21	218	4.25	5.45
G45	Wholesale and retail trade and repair services of motor	75.94	1,058	1.47	1.99
G46	Wholesale trade services, except of motor vehicles and	464.39	2,862	1.52	1.94
G47	Retail trade services, except motor vehicles & motorcycles	277.72	6,272	1.49	1.72
H49	Land transport services and transport services via pipelines	2.30	34	1.67	2.14
H50	Water transport services	4.38	10	1.65	2.71
H51	Air transport services	3.23	57	1.75	2.88
H52	Warehousing and support services for transportation	20.83	154	1.68	2.13
I	Accommodation and food services	146.34	2,917	1.79	2.28
J58	Publishing services	162.17	1,340	1.80	2.20
J59_60	Motion picture, video and television programme production	4.95	54	1.66	2.08
J62_63	Computer programming, consultancy and related services;	0.45	5	1.80	2.11
K64	Financial services, except insurance and pension funding	20.97	153	1.55	1.79
K65	Insurance, reinsurance and pension funding services, except	6.07	41	1.66	2.03
M69_70	Legal and accounting services; services of head offices;	52.49	191	1.55	1.77
M72	Scientific research and development services	3.00	10	1.49	1.80
M74_75	Other professional, scientific and technical services and	3.66	126	1.96	2.37
N77	Rental and leasing services	2.61	5	1.67	1.97
N78	Employment services	4.30	52	1.21	1.29
N79	Travel agency, tour operator and other reservation services	11.44	159	1.34	2.74
N80-82	Security and investigation services; services to buildings	4.61	114	1.73	2.05
O	Public administration and defence services; compulsory	132.80	1,929	1.26	1.38
P	Education services	1,955.57	32,720	1.14	1.19
Q86	Human health services	27.88	455	1.59	1.83
Q87_88	Residential care services; social work services without	10.21	315	1.31	1.46
R90-92	Creative, arts, entertainment, library, archive, museum,	29.79	527	1.66	1.96
R93_1	Sport services	712.57	15,420	1.79	2.15
R93_2	Sporting services and amusement and recreation services	14.80	322	1.79	2.15
S95	Repair services of computers and personal and household	2.76	38	1.58	1.89

National Data Sheet
Bulgaria

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	0.04 bn €	0.09%
Narrow Definition	0.26 bn €	0.61%
Broad Definition	0.34 bn €	0.80%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	4,647	0.16%
Narrow Definition	36,634	1.27%
Broad Definition	44,756	1.55%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	0.18	20	1.83	2.15
C10-12	Food, beverages and tobacco products	0.02	2	2.02	2.34
C13-15	Textiles, wearing apparel, leather and related products	37.53	8,478	1.65	2.04
C18	Printing and recording services	0.31	26	1.90	2.29
C19	Coke and refined petroleum products	0.00	0		
C21	Basic pharmaceutical products and pharmaceutical	0.56	34	1.64	2.21
C22	Rubber and plastic products	0.02	3	1.64	2.24
C25	Fabricated metal products, except machinery & equipment	0.61	102	1.75	2.17
C26	Computer, electronic and optical products	0.00	0		
C29	Motor vehicles, trailers and semi-trailers	0.28	17	1.76	2.20
C30	Other transport equipment	0.29	19	1.75	2.25
C31_32	Furniture and other manufactured goods	14.86	3,371	1.80	2.35
C33	Repair and installation services of machinery & equipment	2.19	211	1.65	2.04
F	Constructions and construction works	4.49	345	1.86	2.26
G45	Wholesale and retail trade and repair services of motor	0.52	71	1.62	1.82
G46	Wholesale trade services, except of motor vehicles and	2.10	120	1.79	2.14
G47	Retail trade services, except motor vehicles & motorcycles	5.97	1,531	1.54	1.75
H49	Land transport services and transport services via pipelines	0.90	63	1.65	1.96
H50	Water transport services	0.40	30	1.70	2.01
H51	Air transport services	0.16	2	1.85	2.15
H52	Warehousing and support services for transportation	0.41	14	1.75	2.01
I	Accommodation and food services	9.40	1,467	1.66	1.95
J58	Publishing services	12.75	873	1.67	2.06
J59_60	Motion picture, video and television programme production	0.35	28	1.85	2.14
J62_63	Computer programming, consultancy and related services;	0.00	0		
K64	Financial services, except insurance and pension funding	0.38	6	1.32	1.37
K65	Insurance, reinsurance and pension funding services, except	0.60	8	1.59	1.66
M69_70	Legal and accounting services; services of head offices;	0.49	42	1.69	1.88
M72	Scientific research and development services	0.07	2	1.43	1.50
M74_75	Other professional, scientific and technical services and	1.55	59	1.87	2.12
N77	Rental and leasing services	0.53	8	1.62	1.80
N78	Employment services	0.62	7	1.53	1.67
N79	Travel agency, tour operator and other reservation services	0.16	4	1.93	2.22
N80-82	Security and investigation services; services to buildings	0.05	11	1.76	1.89
O	Public administration and defence services; compulsory	48.62	4,973	1.39	1.53
P	Education services	132.21	15,768	1.32	1.44
Q86	Human health services	16.65	1,748	1.51	1.79
Q87_88	Residential care services; social work services without	0.05	14	1.66	1.86
R90-92	Creative, arts, entertainment, library, archive, museum,	0.03	3	2.04	2.22
R93_1	Sport services	37.09	4,647	1.80	2.02
R93_2	Sporting services and amusement and recreation services	3.59	581	1.82	2.07
S95	Repair services of computers and personal and household	0.63	49	1.52	1.63

National Data Sheet
Cyprus

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	0.10 bn €	0.51%
Narrow Definition	0.25 bn €	1.26%
Broad Definition	0.36 bn €	1.85%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	1,456	0.39%
Narrow Definition	4,877	1.30%
Broad Definition	7,813	2.08%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	0.64	80	1.61	1.89
C10-12	Food, beverages and tobacco products	1.23	58	2.17	2.73
C13-15	Textiles, wearing apparel, leather and related products	1.18	58	1.44	1.86
C18	Printing and recording services	4.74	196	1.42	1.94
C19	Coke and refined petroleum products	0.00	0		
C21	Basic pharmaceutical products and pharmaceutical	5.87	58	1.43	1.84
C22	Rubber and plastic products	0.06	3	1.52	2.09
C25	Fabricated metal products, except machinery & equipment	1.26	22	1.57	2.30
C26	Computer, electronic and optical products	0.00	0		
C29	Motor vehicles, trailers and semi-trailers	0.00	0		
C30	Other transport equipment	0.48	35	1.54	1.87
C31_32	Furniture and other manufactured goods	0.00	0		
C33	Repair and installation services of machinery & equipment	0.46	25	1.22	1.43
F	Constructions and construction works	6.84	161	1.89	2.22
G45	Wholesale and retail trade and repair services of motor	0.05	1	1.43	1.80
G46	Wholesale trade services, except of motor vehicles and	1.86	29	1.39	1.51
G47	Retail trade services, except motor vehicles & motorcycles	27.43	634	1.43	1.59
H49	Land transport services and transport services via pipelines	1.54	20	1.45	1.72
H50	Water transport services	0.00	0		
H51	Air transport services	0.05	5	1.84	2.53
H52	Warehousing and support services for transportation	0.59	10	1.67	2.11
I	Accommodation and food services	8.36	278	1.64	1.90
J58	Publishing services	10.59	245	1.50	1.71
J59_60	Motion picture, video and television programme production	13.78	391	1.64	1.80
J62_63	Computer programming, consultancy and related services;	0.63	10	1.41	1.60
K64	Financial services, except insurance and pension funding	1.79	100	1.57	1.75
K65	Insurance, reinsurance and pension funding services, except	2.50	325	1.67	1.84
M69_70	Legal and accounting services; services of head offices;	5.43	109	1.21	1.32
M72	Scientific research and development services	0.00	0		
M74_75	Other professional, scientific and technical services and	1.98	51	1.39	1.60
N77	Rental and leasing services	0.52	10	1.32	1.50
N78	Employment services	0.30	9	1.31	1.47
N79	Travel agency, tour operator and other reservation services	0.06	2	1.39	1.60
N80-82	Security and investigation services; services to buildings	2.84	171	1.28	1.43
O	Public administration and defence services; compulsory	2.39	45	1.27	1.36
P	Education services	65.02	1,321	1.16	1.22
Q86	Human health services	22.95	332	1.35	1.58
Q87_88	Residential care services; social work services without	1.55	85	1.35	1.50
R90-92	Creative, arts, entertainment, library, archive, museum,	43.79	883	1.54	1.70
R93_1	Sport services	99.16	1,456	1.51	1.71
R93_2	Sporting services and amusement and recreation services	21.36	465	1.40	1.52
S95	Repair services of computers and personal and household	1.79	130	1.40	1.70

European Commission | Sport

National Data Sheet
Czech Republic

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	0.34 bn €	0.21%
Narrow Definition	1.70 bn €	1.05%
Broad Definition	2.06 bn €	1.27%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	17,575	0.37%
Narrow Definition	72,522	1.51%
Broad Definition	84,803	1.76%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	3.30	207	1.90	2.41
C10-12	Food, beverages and tobacco products	3.40	113	2.07	2.63
C13-15	Textiles, wearing apparel, leather and related products	57.66	3,601	1.57	2.26
C18	Printing and recording services	1.07	37	1.83	2.24
C19	Coke and refined petroleum products	3.16	136	1.36	1.56
C21	Basic pharmaceutical products and pharmaceutical	11.08	327	1.72	2.08
C22	Rubber and plastic products	49.60	1,320	1.52	2.46
C25	Fabricated metal products, except machinery & equipment	17.37	821	1.68	2.32
C26	Computer, electronic and optical products	0.51	19	1.32	2.09
C29	Motor vehicles, trailers and semi-trailers	414.24	13,688	1.71	2.90
C30	Other transport equipment	30.96	953	1.48	2.22
C31_32	Furniture and other manufactured goods	90.68	4,532	1.66	2.23
C33	Repair and installation services of machinery & equipment	2.09	61	1.86	2.18
F	Constructions and construction works	42.19	1,278	2.31	2.67
G45	Wholesale and retail trade and repair services of motor	11.72	423	1.65	2.24
G46	Wholesale trade services, except of motor vehicles and	81.22	834	1.74	1.97
G47	Retail trade services, except motor vehicles & motorcycles	0.00	0		
H49	Land transport services and transport services via pipelines	14.86	580	1.77	2.05
H50	Water transport services	0.31	68	2.18	2.44
H51	Air transport services	8.08	135	2.06	2.40
H52	Warehousing and support services for transportation	0.90	6	1.96	2.17
I	Accommodation and food services	95.21	4,308	1.77	2.12
J58	Publishing services	64.86	1,980	1.79	2.26
J59_60	Motion picture, video and television programme production	24.09	273	1.69	1.97
J62_63	Computer programming, consultancy and related services;	0.56	10	1.62	1.77
K64	Financial services, except insurance and pension funding	3.31	42	1.54	1.66
K65	Insurance, reinsurance and pension funding services, except	1.25	27	1.96	2.18
M69_70	Legal and accounting services; services of head offices;	5.97	164	1.72	1.92
M72	Scientific research and development services	1.83	14	1.16	1.22
M74_75	Other professional, scientific and technical services and	0.65	22	2.13	2.45
N77	Rental and leasing services	1.68	7	1.64	1.87
N78	Employment services	0.22	15	2.08	2.42
N79	Travel agency, tour operator and other reservation services	1.49	123	2.31	2.84
N80-82	Security and investigation services; services to buildings	1.01	45	1.81	2.01
O	Public administration and defence services; compulsory	38.45	1,096	1.47	1.57
P	Education services	475.38	23,265	1.29	1.40
Q86	Human health services	146.41	5,943	1.38	1.70
Q87_88	Residential care services; social work services without	3.93	388	1.38	1.48
R90-92	Creative, arts, entertainment, library, archive, museum,	1.58	72	1.73	1.94
R93_1	Sport services	336.38	17,575	2.12	2.48
R93_2	Sporting services and amusement and recreation services	3.35	182	2.12	2.40
S95	Repair services of computers and personal and household	3.47	111	1.69	1.83

National Data Sheet
Germany

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	13.33 bn €	0.48%
Narrow Definition	63.51 bn €	2.30%
Broad Definition	104.71 bn €	3.90%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	113,793	0.30%
Narrow Definition	1,041,882	2.72%
Broad Definition	1,761,369	4.60%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	116.25	3,430	1.88	2.20
C10-12	Food, beverages and tobacco products	334.44	3,236	2.07	2.54
C13-15	Textiles, wearing apparel, leather and related products	486.30	4,853	1.87	2.35
C18	Printing and recording services	87.96	971	1.95	2.31
C19	Coke and refined petroleum products	307.92	3,236	1.16	1.23
C21	Basic pharmaceutical products and pharmaceutical	162.06	1,618	1.66	2.17
C22	Rubber and plastic products	322.80	3,236	1.69	2.01
C25	Fabricated metal products, except machinery & equipment	542.54	6,471	2.01	2.40
C26	Computer, electronic and optical products	299.53	3,236	1.81	2.17
C29	Motor vehicles, trailers and semi-trailers	4,432.47	49,773	1.99	2.49
C30	Other transport equipment	311.05	3,236	1.93	2.39
C31_32	Furniture and other manufactured goods	603.72	6,471	1.89	2.27
C33	Repair and installation services of machinery & equipment	536.63	6,471	1.95	2.41
F	Constructions and construction works	5,098.02	82,712	1.83	2.03
G45	Wholesale and retail trade and repair services of motor	2,146.82	51,772	1.62	1.80
G46	Wholesale trade services, except of motor vehicles and	10,538.28	271,811	1.71	1.83
G47	Retail trade services, except motor vehicles & motorcycles	9,085.42	223,845	1.67	1.78
H49	Land transport services and transport services via pipelines	1,146.55	29,758	1.88	2.01
H50	Water transport services	274.25	7,440	1.31	1.39
H51	Air transport services	277.18	7,440	1.60	1.74
H52	Warehousing and support services for transportation	237.67	6,919	1.83	1.99
I	Accommodation and food services	10,352.75	267,826	1.81	2.01
J58	Publishing services	1,087.29	11,691	1.85	2.02
J59_60	Motion picture, video and television programme production	1,144.48	11,436	1.78	1.91
J62_63	Computer programming, consultancy and related services;	65.08	686	1.79	1.95
K64	Financial services, except insurance and pension funding	1,570.62	9,686	1.98	2.12
K65	Insurance, reinsurance and pension funding services, except	1,125.34	7,265	2.12	2.24
M69_70	Legal and accounting services; services of head offices;	697.38	4,843	1.91	2.03
M72	Scientific research and development services	217.35	1,211	1.93	2.15
M74_75	Other professional, scientific and technical services and	336.33	2,422	2.02	2.21
N77	Rental and leasing services	338.96	2,422	2.01	2.12
N78	Employment services	331.59	2,422	1.94	2.07
N79	Travel agency, tour operator and other reservation services	376.08	2,526	2.98	3.08
N80-82	Security and investigation services; services to buildings	168.33	1,211	1.97	2.18
O	Public administration and defence services; compulsory	16,652.78	247,461	1.45	1.53
P	Education services	9,921.94	151,178	1.49	1.54
Q86	Human health services	4,107.41	61,865	1.44	1.53
Q87_88	Residential care services; social work services without	2,476.19	37,119	1.45	1.54
R90-92	Creative, arts, entertainment, library, archive, museum,	2,473.17	37,119	1.47	1.55
R93_1	Sport services	13,326.03	113,793	1.31	1.35
R93_2	Sporting services and amusement and recreation services	555.31	8,661	1.54	1.62
S95	Repair services of computers and personal and household	34.80	594	1.45	1.60

National Data Sheet

Denmark

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	0.88 bn €	0.35%
Narrow Definition	3.15 bn €	1.24%
Broad Definition	3.97 bn €	1.56%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	21,385	0.82%
Narrow Definition	54,418	2.08%
Broad Definition	64,082	2.45%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	5.64	79	1.76	2.17
C10-12	Food, beverages and tobacco products	5.63	63	1.93	2.47
C13-15	Textiles, wearing apparel, leather and related products	84.74	1,731	1.58	2.19
C18	Printing and recording services	0.75	13	1.65	1.94
C19	Coke and refined petroleum products	6.27	0	1.85	2.63
C21	Basic pharmaceutical products and pharmaceutical	16.68	68	1.39	1.70
C22	Rubber and plastic products	19.89	233	1.43	1.82
C25	Fabricated metal products, except machinery & equipment	22.10	360	1.62	2.21
C26	Computer, electronic and optical products	1.04	10	1.43	1.60
C29	Motor vehicles, trailers and semi-trailers	18.42	279	1.53	2.04
C30	Other transport equipment	20.65	392	1.59	2.14
C31_32	Furniture and other manufactured goods	48.81	427	1.35	1.67
C33	Repair and installation services of machinery & equipment	6.37	61	1.53	1.95
F	Constructions and construction works	93.12	1,112	1.70	2.16
G45	Wholesale and retail trade and repair services of motor	43.19	690	1.49	1.83
G46	Wholesale trade services, except of motor vehicles and	285.64	1,459	1.53	1.84
G47	Retail trade services, except motor vehicles & motorcycles	161.54	4,354	1.55	1.75
H49	Land transport services and transport services via pipelines	41.73	471	1.64	2.01
H50	Water transport services	40.23	76	1.12	1.22
H51	Air transport services	16.44	128	1.49	1.93
H52	Warehousing and support services for transportation	42.99	353	1.55	1.86
I	Accommodation and food services	103.02	2,462	1.66	2.02
J58	Publishing services	167.06	1,750	1.70	1.95
J59_60	Motion picture, video and television programme production	32.12	240	1.66	2.01
J62_63	Computer programming, consultancy and related services;	1.54	21	1.65	1.98
K64	Financial services, except insurance and pension funding	7.24	35	1.46	1.58
K65	Insurance, reinsurance and pension funding services, except	2.76	24	1.71	1.88
M69_70	Legal and accounting services; services of head offices;	38.74	357	1.42	1.56
M72	Scientific research and development services	1.00	7	1.65	1.95
M74_75	Other professional, scientific and technical services and	0.96	19	1.71	2.04
N77	Rental and leasing services	2.14	10	1.78	2.09
N78	Employment services	0.60	5	1.56	1.74
N79	Travel agency, tour operator and other reservation services	5.10	60	1.52	1.95
N80-82	Security and investigation services; services to buildings	2.73	51	1.58	1.83
O	Public administration and defence services; compulsory	70.94	703	1.37	1.56
P	Education services	1,177.27	16,737	1.30	1.41
Q86	Human health services	326.56	4,164	1.31	1.51
Q87_88	Residential care services; social work services without	4.33	90	1.28	1.41
R90-92	Creative, arts, entertainment, library, archive, museum,	26.83	284	1.43	1.58
R93_1	Sport services	883.46	21,385	1.55	1.76
R93_2	Sporting services and amusement and recreation services	133.54	3,290	1.55	1.76
S95	Repair services of computers and personal and household	2.76	30	1.55	1.89

National Data Sheet
Estonia

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	0.01 bn €	0.07%
Narrow Definition	0.13 bn €	0.72%
Broad Definition	0.16 bn €	0.88%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	2,791	0.47%
Narrow Definition	12,059	2.04%
Broad Definition	13,656	2.31%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	0.58	44	1.69	2.31
C10-12	Food, beverages and tobacco products	0.22	13	1.80	2.56
C13-15	Textiles, wearing apparel, leather and related products	9.27	910	1.26	1.70
C18	Printing and recording services	1.98	130	1.44	2.13
C19	Coke and refined petroleum products	7.36	126	1.76	2.09
C21	Basic pharmaceutical products and pharmaceutical	0.13	7	1.18	1.23
C22	Rubber and plastic products	0.95	66	1.37	2.06
C25	Fabricated metal products, except machinery & equipment	0.13	12	1.45	1.75
C26	Computer, electronic and optical products	0.00	0		
C29	Motor vehicles, trailers and semi-trailers	14.31	921	1.18	1.33
C30	Other transport equipment	10.13	843	1.70	2.30
C31_32	Furniture and other manufactured goods	8.85	583	1.48	2.03
C33	Repair and installation services of machinery & equipment	1.38	61	1.49	2.01
F	Constructions and construction works	2.22	166	1.67	2.12
G45	Wholesale and retail trade and repair services of motor	0.05	3	1.39	1.48
G46	Wholesale trade services, except of motor vehicles and	7.10	179	1.51	1.83
G47	Retail trade services, except motor vehicles & motorcycles	6.67	603	1.60	1.81
H49	Land transport services and transport services via pipelines	0.98	53	1.59	2.07
H50	Water transport services	0.00	0		
H51	Air transport services	0.17	5	1.74	2.10
H52	Warehousing and support services for transportation	0.00	0		
I	Accommodation and food services	1.22	124	1.78	2.31
J58	Publishing services	0.93	67	1.76	2.10
J59_60	Motion picture, video and television programme production	0.00	0		
J62_63	Computer programming, consultancy and related services;	0.00	0		
K64	Financial services, except insurance and pension funding	0.01	0	1.38	1.47
K65	Insurance, reinsurance and pension funding services, except	0.00	0		
M69_70	Legal and accounting services; services of head offices;	0.00	0		
M72	Scientific research and development services	0.40	4	1.29	1.35
M74_75	Other professional, scientific and technical services and	0.05	5	1.57	1.70
N77	Rental and leasing services	0.01	0	1.33	1.41
N78	Employment services	0.00	0		
N79	Travel agency, tour operator and other reservation services	1.10	82	1.95	2.34
N80-82	Security and investigation services; services to buildings	0.00	0		
O	Public administration and defence services; compulsory	3.14	130	1.31	1.52
P	Education services	55.28	4,845	1.30	1.43
Q86	Human health services	0.70	41	1.24	1.32
Q87_88	Residential care services; social work services without	0.00	0		
R90-92	Creative, arts, entertainment, library, archive, museum,	9.93	776	1.58	1.82
R93_1	Sport services	12.42	2,791	1.75	2.03
R93_2	Sporting services and amusement and recreation services	0.49	34	1.74	2.03
S95	Repair services of computers and personal and household	0.51	32	1.42	1.62

European Commission | Sport

National Data Sheet
Greece

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	0.16 bn €	0.08%
Narrow Definition	1.34 bn €	0.70%
Broad Definition	1.78 bn €	0.93%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	5,603	0.15%
Narrow Definition	38,883	1.07%
Broad Definition	47,486	1.31%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	0.59	54	1.55	1.68
C10-12	Food, beverages and tobacco products	0.78	15	1.91	2.12
C13-15	Textiles, wearing apparel, leather and related products	28.42	816	1.66	1.93
C18	Printing and recording services	0.98	41	1.57	1.91
C19	Coke and refined petroleum products	12.12	35	1.32	1.39
C21	Basic pharmaceutical products and pharmaceutical	4.79	120	1.74	1.92
C22	Rubber and plastic products	1.21	20	1.60	2.05
C25	Fabricated metal products, except machinery & equipment	0.42	10	1.76	1.95
C26	Computer, electronic and optical products	0.61	11	1.46	1.61
C29	Motor vehicles, trailers and semi-trailers	7.58	128	1.60	1.83
C30	Other transport equipment	4.41	252	1.50	1.60
C31_32	Furniture and other manufactured goods	3.74	164	1.72	1.96
C33	Repair and installation services of machinery & equipment	2.98	32	1.48	1.60
F	Constructions and construction works	26.32	549	1.76	1.93
G45	Wholesale and retail trade and repair services of motor	20.86	486	1.39	1.47
G46	Wholesale trade services, except of motor vehicles and	145.30	1,505	1.51	1.68
G47	Retail trade services, except motor vehicles & motorcycles	103.49	5,418	1.40	1.51
H49	Land transport services and transport services via pipelines	15.62	333	1.54	1.63
H50	Water transport services	12.73	56	1.55	1.67
H51	Air transport services	5.06	57	1.61	1.72
H52	Warehousing and support services for transportation	8.23	137	1.53	1.61
I	Accommodation and food services	149.90	4,023	1.64	1.82
J58	Publishing services	103.90	1,340	1.63	1.79
J59_60	Motion picture, video and television programme production	5.21	70	1.65	1.78
J62_63	Computer programming, consultancy and related services;	1.77	38	1.54	1.64
K64	Financial services, except insurance and pension funding	2.37	26	1.31	1.37
K65	Insurance, reinsurance and pension funding services, except	8.53	124	1.78	1.84
M69_70	Legal and accounting services; services of head offices;	3.68	94	1.35	1.41
M72	Scientific research and development services	0.68	5	1.44	1.53
M74_75	Other professional, scientific and technical services and	0.45	18	1.73	1.78
N77	Rental and leasing services	0.56	3	1.62	1.74
N78	Employment services	0.85	14	1.21	1.22
N79	Travel agency, tour operator and other reservation services	12.53	239	1.96	2.14
N80-82	Security and investigation services; services to buildings	0.72	19	1.43	1.47
O	Public administration and defence services; compulsory	20.70	356	1.32	1.37
P	Education services	821.05	23,096	1.09	1.11
Q86	Human health services	41.29	747	1.29	1.37
Q87_88	Residential care services; social work services without	2.67	154	1.61	1.82
R90-92	Creative, arts, entertainment, library, archive, museum,	37.14	511	1.46	1.50
R93_1	Sport services	157.97	5,603	1.71	1.83
R93_2	Sporting services and amusement and recreation services	1.50	700	1.71	1.86
S95	Repair services of computers and personal and household	4.34	69	1.17	1.21

National Data Sheet
Spain

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	1.52 bn €	0.15%
Narrow Definition	8.71 bn €	0.84%
Broad Definition	14.98 bn €	1.44%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	30,625	0.18%
Narrow Definition	165,946	0.95%
Broad Definition	261,839	1.50%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	88.40	2,494	1.92	2.11
C10-12	Food, beverages and tobacco products	7.54	91	2.50	2.82
C13-15	Textiles, wearing apparel, leather and related products	210.99	4,702	2.14	2.50
C18	Printing and recording services	75.64	1,291	1.95	2.19
C19	Coke and refined petroleum products	27.07	45	1.26	1.32
C21	Basic pharmaceutical products and pharmaceutical	29.26	207	1.73	2.00
C22	Rubber and plastic products	9.43	145	1.89	2.26
C25	Fabricated metal products, except machinery & equipment	101.95	2,009	2.04	2.38
C26	Computer, electronic and optical products	18.80	237	1.63	1.90
C29	Motor vehicles, trailers and semi-trailers	0.25	4	1.87	2.74
C30	Other transport equipment	722.14	5,858	1.13	1.19
C31_32	Furniture and other manufactured goods	77.59	1,440	1.92	2.14
C33	Repair and installation services of machinery & equipment	5.93	105	1.77	2.02
F	Constructions and construction works	444.90	7,449	1.99	2.17
G45	Wholesale and retail trade and repair services of motor	26.58	479	1.60	1.74
G46	Wholesale trade services, except of motor vehicles and	221.98	4,595	1.73	1.86
G47	Retail trade services, except motor vehicles & motorcycles	368.26	12,871	1.52	1.57
H49	Land transport services and transport services via pipelines	1,380.70	26,622	1.80	1.94
H50	Water transport services	16.54	202	1.99	2.16
H51	Air transport services	18.59	227	1.94	2.17
H52	Warehousing and support services for transportation	14.28	166	2.03	2.19
I	Accommodation and food services	941.59	14,732	1.76	1.89
J58	Publishing services	73.53	1,030	2.01	2.22
J59_60	Motion picture, video and television programme production	697.38	9,908	2.00	2.15
J62_63	Computer programming, consultancy and related services;	28.80	462	1.60	1.74
K64	Financial services, except insurance and pension funding	325.07	2,711	1.45	1.51
K65	Insurance, reinsurance and pension funding services, except	80.72	420	1.81	1.87
M69_70	Legal and accounting services; services of head offices;	97.89	2,027	1.51	1.59
M72	Scientific research and development services	24.22	295	1.47	1.62
M74_75	Other professional, scientific and technical services and	18.81	519	1.60	1.71
N77	Rental and leasing services	33.02	316	1.60	1.75
N78	Employment services	5.21	226	1.19	1.20
N79	Travel agency, tour operator and other reservation services	2.39	40	2.20	2.49
N80-82	Security and investigation services; services to buildings	97.10	3,950	1.45	1.53
O	Public administration and defence services; compulsory	125.99	2,545	1.38	1.45
P	Education services	4,136.66	76,087	1.19	1.22
Q86	Human health services	156.33	2,491	1.48	1.60
Q87_88	Residential care services; social work services without	267.16	6,430	1.51	1.61
R90-92	Creative, arts, entertainment, library, archive, museum,	2,189.66	29,901	1.61	1.68
R93_1	Sport services	1,516.53	30,625	1.76	1.86
R93_2	Sporting services and amusement and recreation services	297.85	5,826	1.64	1.72
S95	Repair services of computers and personal and household	1.30	55	1.73	1.89

National Data Sheet
Finland

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	1.19 bn €	0.60%
Narrow Definition	2.73 bn €	1.37%
Broad Definition	3.26 bn €	1.63%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	20,811	0.86%
Narrow Definition	43,743	1.81%
Broad Definition	50,634	2.09%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	1.99	70	1.92	2.21
C10-12	Food, beverages and tobacco products	5.62	71	2.03	2.45
C13-15	Textiles, wearing apparel, leather and related products	21.43	344	1.54	1.85
C18	Printing and recording services	2.16	36	1.74	2.01
C19	Coke and refined petroleum products	24.27	40	1.26	1.42
C21	Basic pharmaceutical products and pharmaceutical	3.88	13	1.28	1.36
C22	Rubber and plastic products	26.74	295	1.59	1.95
C25	Fabricated metal products, except machinery & equipment	11.20	146	1.74	2.14
C26	Computer, electronic and optical products	5.36	56	1.51	1.77
C29	Motor vehicles, trailers and semi-trailers	26.94	480	1.54	1.87
C30	Other transport equipment	28.37	429	1.81	2.31
C31_32	Furniture and other manufactured goods	26.08	459	1.68	2.09
C33	Repair and installation services of machinery & equipment	5.67	75	1.59	1.85
F	Constructions and construction works	54.91	655	1.84	2.17
G45	Wholesale and retail trade and repair services of motor	2.95	43	1.55	1.74
G46	Wholesale trade services, except of motor vehicles and	168.97	1,601	1.59	1.85
G47	Retail trade services, except motor vehicles & motorcycles	137.72	2,896	1.59	1.82
H49	Land transport services and transport services via pipelines	30.08	366	1.73	1.91
H50	Water transport services	5.63	50	1.54	1.79
H51	Air transport services	11.42	65	1.75	2.17
H52	Warehousing and support services for transportation	12.16	156	1.94	2.25
I	Accommodation and food services	80.09	1,780	1.78	2.06
J58	Publishing services	180.15	2,040	1.71	2.02
J59_60	Motion picture, video and television programme production	8.71	82	1.60	1.89
J62_63	Computer programming, consultancy and related services;	0.60	7	1.56	1.70
K64	Financial services, except insurance and pension funding	5.71	60	1.65	1.84
K65	Insurance, reinsurance and pension funding services, except	5.26	37	1.46	1.63
M69_70	Legal and accounting services; services of head offices;	5.22	72	1.55	1.77
M72	Scientific research and development services	2.44	40	1.34	1.43
M74_75	Other professional, scientific and technical services and	2.32	57	1.75	2.03
N77	Rental and leasing services	0.48	3	1.69	1.86
N78	Employment services	3.97	16	1.31	1.39
N79	Travel agency, tour operator and other reservation services	5.60	72	1.83	2.25
N80-82	Security and investigation services; services to buildings	5.83	148	1.57	1.81
O	Public administration and defence services; compulsory	53.40	428	1.55	1.71
P	Education services	946.37	13,816	1.35	1.46
Q86	Human health services	106.80	1,738	1.50	1.71
Q87_88	Residential care services; social work services without	29.26	718	1.35	1.45
R90-92	Creative, arts, entertainment, library, archive, museum,	8.75	200	1.66	1.86
R93_1	Sport services	1,190.53	20,811	1.69	1.92
R93_2	Sporting services and amusement and recreation services	5.92	103	1.70	1.92
S95	Repair services of computers and personal and household	2.63	60	1.52	1.70

National Data Sheet
France

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	7.81 bn €	0.37%
Narrow Definition	26.69 bn €	1.28%
Broad Definition	39.92 bn €	1.91%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	83,086	0.33%
Narrow Definition	390,455	1.53%
Broad Definition	582,709	2.29%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	22.44	472	1.89	2.26
C10-12	Food, beverages and tobacco products	8.46	95	2.15	2.55
C13-15	Textiles, wearing apparel, leather and related products	294.05	5,757	1.71	2.29
C18	Printing and recording services	35.16	677	1.71	2.05
C19	Coke and refined petroleum products	18.73	49	1.44	1.61
C21	Basic pharmaceutical products and pharmaceutical	79.11	612	1.53	1.79
C22	Rubber and plastic products	96.26	1,784	1.67	2.13
C25	Fabricated metal products, except machinery & equipment	22.56	321	1.71	2.09
C26	Computer, electronic and optical products	23.71	334	1.53	1.81
C29	Motor vehicles, trailers and semi-trailers	102.87	2,388	1.89	2.49
C30	Other transport equipment	299.03	3,414	1.65	2.04
C31_32	Furniture and other manufactured goods	464.53	9,136	1.68	2.06
C33	Repair and installation services of machinery & equipment	45.50	356	1.65	2.02
F	Constructions and construction works	472.41	6,635	1.87	2.19
G45	Wholesale and retail trade and repair services of motor	372.57	5,317	1.57	1.80
G46	Wholesale trade services, except of motor vehicles and	1,029.89	10,302	1.82	2.01
G47	Retail trade services, except motor vehicles & motorcycles	995.05	19,762	1.59	1.74
H49	Land transport services and transport services via pipelines	280.47	4,393	1.67	1.83
H50	Water transport services	12.63	57	2.07	2.33
H51	Air transport services	24.88	210	1.65	1.84
H52	Warehousing and support services for transportation	27.94	257	1.64	1.77
I	Accommodation and food services	623.77	9,987	1.72	1.92
J58	Publishing services	1,436.17	12,130	1.71	1.94
J59_60	Motion picture, video and television programme production	204.92	1,678	1.85	2.11
J62_63	Computer programming, consultancy and related services;	9.84	80	1.55	1.63
K64	Financial services, except insurance and pension funding	81.05	725	1.76	1.86
K65	Insurance, reinsurance and pension funding services, except	28.13	326	2.28	2.41
M69_70	Legal and accounting services; services of head offices;	70.15	552	1.87	2.01
M72	Scientific research and development services	30.81	149	1.64	1.77
M74_75	Other professional, scientific and technical services and	27.28	425	1.64	1.79
N77	Rental and leasing services	30.16	80	1.63	1.74
N78	Employment services	13.96	60	1.11	1.12
N79	Travel agency, tour operator and other reservation services	37.74	890	2.16	2.39
N80-82	Security and investigation services; services to buildings	25.49	415	1.75	1.88
O	Public administration and defence services; compulsory	10,867.74	169,903	1.35	1.44
P	Education services	13,286.36	220,668	1.26	1.32
Q86	Human health services	254.29	3,648	1.28	1.37
Q87_88	Residential care services; social work services without	91.72	2,307	1.24	1.29
R90-92	Creative, arts, entertainment, library, archive, museum,	130.10	1,826	1.60	1.75
R93_1	Sport services	7,810.96	83,086	1.67	1.88
R93_2	Sporting services and amusement and recreation services	122.28	1,327	1.66	1.87
S95	Repair services of computers and personal and household	12.12	121	1.45	1.62

National Data Sheet
Croatia

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	0.18 bn €	0.40%
Narrow Definition	0.49 bn €	1.12%
Broad Definition	0.68 bn €	1.54%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	a	a
Narrow Definition	21,386	1.40%
Broad Definition	27,908	1.83%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	0.54	50	1.60	1.74
C10-12	Food, beverages and tobacco products	0.39	14	1.77	1.92
C13-15	Textiles, wearing apparel, leather and related products	13.53	1,114	1.51	1.89
C18	Printing and recording services	0.39	10	1.63	1.91
C19	Coke and refined petroleum products	6.89	40	1.43	1.52
C21	Basic pharmaceutical products and pharmaceutical	2.81	46	1.52	1.83
C22	Rubber and plastic products	0.70	53	1.61	2.01
C25	Fabricated metal products, except machinery & equipment	2.59	204	1.59	2.03
C26	Computer, electronic and optical products	0.45	16	1.58	2.02
C29	Motor vehicles, trailers and semi-trailers	1.27	61	1.61	2.33
C30	Other transport equipment	15.29	1,010	1.85	2.41
C31_32	Furniture and other manufactured goods	15.00	1,312	1.56	2.08
C33	Repair and installation services of machinery & equipment	0.48	5	1.62	1.81
F	Constructions and construction works	9.76	335	1.68	2.00
G45	Wholesale and retail trade and repair services of motor	1.83	55	1.53	1.80
G46	Wholesale trade services, except of motor vehicles and	11.50	209	1.60	1.82
G47	Retail trade services, except motor vehicles & motorcycles	27.29	2,106	1.55	1.71
H49	Land transport services and transport services via pipelines	15.77	592	1.66	1.95
H50	Water transport services	6.90	278	1.60	1.84
H51	Air transport services	4.29	3	1.82	2.12
H52	Warehousing and support services for transportation	1.08	36	1.55	1.66
I	Accommodation and food services	89.68	3,340	1.50	1.76
J58	Publishing services	13.14	890	1.69	2.06
J59_60	Motion picture, video and television programme production	6.86	212	1.73	1.98
J62_63	Computer programming, consultancy and related services;	0.64	12	1.48	1.55
K64	Financial services, except insurance and pension funding	1.66	25	1.29	1.34
K65	Insurance, reinsurance and pension funding services, except	1.02	32	1.66	1.81
M69_70	Legal and accounting services; services of head offices;	1.45	52	1.36	1.43
M72	Scientific research and development services	0.56	14	1.52	1.63
M74_75	Other professional, scientific and technical services and	1.75	59	1.55	1.69
N77	Rental and leasing services	1.55	12	1.60	1.75
N78	Employment services	0.66	13	1.36	1.45
N79	Travel agency, tour operator and other reservation services	2.69	15	1.94	2.19
N80-82	Security and investigation services; services to buildings	0.59	23	1.44	1.51
O	Public administration and defence services; compulsory	23.74	655	1.42	1.56
P	Education services	194.39	10,626	1.28	1.38
Q86	Human health services	1.52	66	1.40	1.59
Q87_88	Residential care services; social work services without	0.76	56	1.41	1.48
R90-92	Creative, arts, entertainment, library, archive, museum,	1.29	58	1.44	1.51
R93_1	Sport services	175.48	a	1.63	1.85
R93_2	Sporting services and amusement and recreation services	17.28	a	1.63	1.82
S95	Repair services of computers and personal and household	0.65	48	1.46	1.59

National Data Sheet
Hungary

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	0.15 bn €	0.15%
Narrow Definition	0.94 bn €	0.95%
Broad Definition	1.25 bn €	1.26%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	7,727	0.20%
Narrow Definition	61,536	1.62%
Broad Definition	75,771	2.00%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	8.07	493	1.84	2.39
C10-12	Food, beverages and tobacco products	0.62	27	1.96	2.73
C13-15	Textiles, wearing apparel, leather and related products	21.94	2,920	1.25	2.00
C18	Printing and recording services	3.68	230	1.58	2.16
C19	Coke and refined petroleum products	4.69	32	1.25	1.90
C21	Basic pharmaceutical products and pharmaceutical	11.55	236	1.18	1.47
C22	Rubber and plastic products	16.46	713	1.42	2.45
C25	Fabricated metal products, except machinery & equipment	0.40	23	1.50	2.33
C26	Computer, electronic and optical products	0.18	9	1.13	1.22
C29	Motor vehicles, trailers and semi-trailers	24.96	986	1.17	2.46
C30	Other transport equipment	7.46	327	1.38	2.24
C31_32	Furniture and other manufactured goods	19.50	1,795	1.44	2.29
C33	Repair and installation services of machinery & equipment	1.93	64	1.37	1.96
F	Constructions and construction works	24.94	1,235	1.62	2.24
G45	Wholesale and retail trade and repair services of motor	4.22	404	1.58	2.14
G46	Wholesale trade services, except of motor vehicles and	14.64	318	1.54	1.90
G47	Retail trade services, except motor vehicles & motorcycles	36.92	3,849	1.59	1.87
H49	Land transport services and transport services via pipelines	1.02	57	1.53	1.98
H50	Water transport services	0.28	61	1.40	1.68
H51	Air transport services	1.97	34	1.23	1.41
H52	Warehousing and support services for transportation	0.57	10	1.51	1.80
I	Accommodation and food services	102.07	7,818	1.83	2.27
J58	Publishing services	51.80	1,590	1.62	2.01
J59_60	Motion picture, video and television programme production	29.39	359	1.36	1.55
J62_63	Computer programming, consultancy and related services;	1.24	34	1.34	1.49
K64	Financial services, except insurance and pension funding	1.94	30	1.44	1.66
K65	Insurance, reinsurance and pension funding services, except	1.15	38	1.73	2.00
M69_70	Legal and accounting services; services of head offices;	6.33	212	1.39	1.56
M72	Scientific research and development services	0.82	6	1.32	1.51
M74_75	Other professional, scientific and technical services and	1.83	46	1.48	1.78
N77	Rental and leasing services	2.00	3	1.23	1.35
N78	Employment services	0.80	14	1.21	1.34
N79	Travel agency, tour operator and other reservation services	4.04	204	1.32	1.61
N80-82	Security and investigation services; services to buildings	5.78	315	1.51	1.84
O	Public administration and defence services; compulsory	88.51	3,047	1.31	1.43
P	Education services	580.61	39,088	1.27	1.37
Q86	Human health services	1.34	75	1.36	1.67
Q87_88	Residential care services; social work services without	1.59	144	1.36	1.65
R90-92	Creative, arts, entertainment, library, archive, museum,	3.39	162	1.55	1.73
R93_1	Sport services	145.96	7,727	1.74	2.06
R93_2	Sporting services and amusement and recreation services	14.02	966	1.74	2.08
S95	Repair services of computers and personal and household	1.10	67	1.39	1.78

National Data Sheet
Ireland

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	0.54 bn €	0.31%
Narrow Definition	1.42 bn €	0.81%
Broad Definition	1.80 bn €	1.03%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	11,520	0.64%
Narrow Definition	24,542	1.37%
Broad Definition	30,008	1.68%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	32.54	679	1.65	2.13
C10-12	Food, beverages and tobacco products	0.89	7	1.49	2.24
C13-15	Textiles, wearing apparel, leather and related products	25.79	947	1.17	1.85
C18	Printing and recording services	8.03	158	1.17	1.87
C19	Coke and refined petroleum products	0.00	0		
C21	Basic pharmaceutical products and pharmaceutical	39.66	124	1.06	1.98
C22	Rubber and plastic products	0.71	10	1.27	2.01
C25	Fabricated metal products, except machinery & equipment	0.49	9	1.25	1.79
C26	Computer, electronic and optical products	0.67	6	1.14	2.00
C29	Motor vehicles, trailers and semi-trailers	1.47	28	1.25	1.99
C30	Other transport equipment	2.94	10	1.20	2.30
C31_32	Furniture and other manufactured goods	0.00	0		
C33	Repair and installation services of machinery & equipment	5.27	94	1.25	1.72
F	Constructions and construction works	16.55	515	1.59	2.27
G45	Wholesale and retail trade and repair services of motor	14.87	413	1.18	1.41
G46	Wholesale trade services, except of motor vehicles and	145.23	759	1.29	1.85
G47	Retail trade services, except motor vehicles & motorcycles	97.59	2,613	1.31	1.64
H49	Land transport services and transport services via pipelines	4.45	109	1.44	1.76
H50	Water transport services	1.18	7	1.60	2.01
H51	Air transport services	2.20	9	1.34	1.94
H52	Warehousing and support services for transportation	13.58	132	1.36	1.53
I	Accommodation and food services	63.35	1,955	1.33	1.60
J58	Publishing services	0.00	0		
J59_60	Motion picture, video and television programme production	0.00	0		
J62_63	Computer programming, consultancy and related services;	34.15	482	1.22	2.22
K64	Financial services, except insurance and pension funding	45.36	292	1.48	1.73
K65	Insurance, reinsurance and pension funding services, except	17.09	158	1.58	2.49
M69_70	Legal and accounting services; services of head offices;	10.55	70	1.30	1.48
M72	Scientific research and development services	4.14	19	1.11	1.29
M74_75	Other professional, scientific and technical services and	6.51	60	1.33	1.58
N77	Rental and leasing services	60.57	34	1.18	1.33
N78	Employment services	2.53	25	1.14	1.25
N79	Travel agency, tour operator and other reservation services	6.00	96	1.08	1.27
N80-82	Security and investigation services; services to buildings	7.20	183	1.26	1.45
O	Public administration and defence services; compulsory	62.05	786	1.39	1.67
P	Education services	432.58	6,404	1.22	1.33
Q86	Human health services	41.04	494	1.20	1.34
Q87_88	Residential care services; social work services without	0.00	0		
R90-92	Creative, arts, entertainment, library, archive, museum,	46.71	579	1.10	1.17
R93_1	Sport services	539.62	11,520	1.08	1.12
R93_2	Sporting services and amusement and recreation services	9.52	205	1.08	1.12
S95	Repair services of computers and personal and household	0.59	15	1.31	1.67

National Data Sheet
Italy

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	3.26 bn €	0.20%
Narrow Definition	13.08 bn €	0.81%
Broad Definition	21.22 bn €	1.32%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	74,381	0.34%
Narrow Definition	280,957	1.27%
Broad Definition	389,120	1.76%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	645.14	18,195	1.81	1.94
C10-12	Food, beverages and tobacco products	7.52	120	2.17	2.55
C13-15	Textiles, wearing apparel, leather and related products	633.31	11,486	1.93	2.19
C18	Printing and recording services	89.79	1,895	1.99	2.26
C19	Coke and refined petroleum products	0.00	0		
C21	Basic pharmaceutical products and pharmaceutical	178.00	1,864	1.52	1.68
C22	Rubber and plastic products	21.94	346	1.90	2.35
C25	Fabricated metal products, except machinery & equipment	287.49	5,469	1.97	2.31
C26	Computer, electronic and optical products	50.98	836	1.64	1.87
C29	Motor vehicles, trailers and semi-trailers	502.29	10,637	2.18	2.61
C30	Other transport equipment	514.09	7,208	2.18	2.44
C31_32	Furniture and other manufactured goods	215.17	4,185	1.94	2.27
C33	Repair and installation services of machinery & equipment	7.69	129	1.88	2.18
F	Constructions and construction works	455.94	8,925	2.30	2.48
G45	Wholesale and retail trade and repair services of motor	30.52	777	1.96	2.22
G46	Wholesale trade services, except of motor vehicles and	269.10	2,906	1.90	2.12
G47	Retail trade services, except motor vehicles & motorcycles	471.59	12,174	1.70	1.82
H49	Land transport services and transport services via pipelines	2,179.93	24,875	1.78	1.97
H50	Water transport services	51.23	579	2.22	2.52
H51	Air transport services	25.56	592	2.03	2.26
H52	Warehousing and support services for transportation	24.43	214	1.94	2.15
I	Accommodation and food services	1,799.24	34,195	1.85	1.99
J58	Publishing services	134.53	1,660	1.90	2.09
J59_60	Motion picture, video and television programme production	300.77	2,817	1.95	2.13
J62_63	Computer programming, consultancy and related services;	63.18	710	1.75	1.92
K64	Financial services, except insurance and pension funding	708.66	5,327	1.52	1.59
K65	Insurance, reinsurance and pension funding services, except	70.75	982	2.00	2.14
M69_70	Legal and accounting services; services of head offices;	300.84	3,632	1.62	1.71
M72	Scientific research and development services	26.74	127	1.66	1.87
M74_75	Other professional, scientific and technical services and	45.10	559	1.70	1.86
N77	Rental and leasing services	66.23	188	1.96	2.16
N78	Employment services	10.87	88	1.23	1.27
N79	Travel agency, tour operator and other reservation services	2.28	59	2.42	2.70
N80-82	Security and investigation services; services to buildings	106.80	2,932	1.89	2.03
O	Public administration and defence services; compulsory	267.76	3,258	1.36	1.41
P	Education services	4,832.10	103,369	1.23	1.26
Q86	Human health services	264.37	4,354	1.51	1.63
Q87_88	Residential care services; social work services without	272.61	9,415	1.75	1.83
R90-92	Creative, arts, entertainment, library, archive, museum,	1,790.42	22,648	1.97	2.08
R93_1	Sport services	3,264.27	74,381	2.05	2.18
R93_2	Sporting services and amusement and recreation services	226.03	4,943	2.05	2.17
S95	Repair services of computers and personal and household	1.68	66	1.74	1.93

National Data Sheet
Lithuania

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	0.02 bn €	0.07%
Narrow Definition	0.24 bn €	0.71%
Broad Definition	0.28 bn €	0.85%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	4,200	0.34%
Narrow Definition	18,000	1.45%
Broad Definition	20,043	1.62%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	0.00	0		
C10-12	Food, beverages and tobacco products	0.46	20	1.72	2.34
C13-15	Textiles, wearing apparel, leather and related products	13.76	1,147	1.23	1.52
C18	Printing and recording services	0.06	2	1.21	1.58
C19	Coke and refined petroleum products	0.00	0		
C21	Basic pharmaceutical products and pharmaceutical	1.36	51	1.31	1.72
C22	Rubber and plastic products	0.00	0		
C25	Fabricated metal products, except machinery & equipment	0.00	0		
C26	Computer, electronic and optical products	0.00	0		
C29	Motor vehicles, trailers and semi-trailers	3.19	123	1.32	2.07
C30	Other transport equipment	34.06	1,308	1.22	1.62
C31_32	Furniture and other manufactured goods	11.28	784	1.37	1.92
C33	Repair and installation services of machinery & equipment	3.14	206	1.46	1.86
F	Constructions and construction works	4.95	210	1.52	1.82
G45	Wholesale and retail trade and repair services of motor	0.12	10	1.16	1.21
G46	Wholesale trade services, except of motor vehicles and	21.30	440	1.38	1.56
G47	Retail trade services, except motor vehicles & motorcycles	20.17	1,020	1.28	1.39
H49	Land transport services and transport services via pipelines	2.10	50	1.49	1.73
H50	Water transport services	0.00	0		
H51	Air transport services	0.46	10	1.58	2.18
H52	Warehousing and support services for transportation	0.00	0		
I	Accommodation and food services	3.53	247	1.38	1.64
J58	Publishing services	1.83	80	1.66	1.85
J59_60	Motion picture, video and television programme production	0.00	0		
J62_63	Computer programming, consultancy and related services;	0.00	0		
K64	Financial services, except insurance and pension funding	1.82	34	1.38	1.52
K65	Insurance, reinsurance and pension funding services, except	0.13	10	1.80	2.08
M69_70	Legal and accounting services; services of head offices;	0.00	0		
M72	Scientific research and development services	0.35	12	1.40	1.66
M74_75	Other professional, scientific and technical services and	0.11	10	1.33	1.62
N77	Rental and leasing services	1.93	40	1.39	1.52
N78	Employment services	0.00	0		
N79	Travel agency, tour operator and other reservation services	2.40	130	1.58	2.02
N80-82	Security and investigation services; services to buildings	1.00	100	1.40	1.58
O	Public administration and defence services; compulsory	5.30	180	1.32	1.45
P	Education services	98.11	8,160	1.27	1.39
Q86	Human health services	1.32	90	1.28	1.45
Q87_88	Residential care services; social work services without	0.00	0		
R90-92	Creative, arts, entertainment, library, archive, museum,	23.14	1,070	1.99	2.29
R93_1	Sport services	22.86	4,200	1.85	2.08
R93_2	Sporting services and amusement and recreation services	0.88	199	1.89	2.16
S95	Repair services of computers and personal and household	1.39	100	1.30	1.46

National Data Sheet
Luxembourg

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	0.14 bn €	0.31%
Narrow Definition	0.41 bn €	0.92%
Broad Definition	0.63 bn €	1.43%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	a	a
Narrow Definition	3,224	1.41%
Broad Definition	4,336	1.89%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	0.36	8	1.22	2.09
C10-12	Food, beverages and tobacco products	0.37	3	1.21	2.12
C13-15	Textiles, wearing apparel, leather and related products	3.49	28	1.32	2.44
C18	Printing and recording services	0.00	0		
C19	Coke and refined petroleum products	0.00	0		
C21	Basic pharmaceutical products and pharmaceutical	0.00	0		
C22	Rubber and plastic products	0.00	0		
C25	Fabricated metal products, except machinery & equipment	0.00	0		
C26	Computer, electronic and optical products	0.00	0		
C29	Motor vehicles, trailers and semi-trailers	0.00	0		
C30	Other transport equipment	0.00	0		
C31_32	Furniture and other manufactured goods	0.00	0		
C33	Repair and installation services of machinery & equipment	0.00	0		
F	Constructions and construction works	19.03	113	1.13	1.64
G45	Wholesale and retail trade and repair services of motor	16.75	96	1.35	1.73
G46	Wholesale trade services, except of motor vehicles and	24.16	55	1.48	2.09
G47	Retail trade services, except motor vehicles & motorcycles	16.37	186	1.74	2.62
H49	Land transport services and transport services via pipelines	1.20	6	1.41	1.93
H50	Water transport services	0.00	0		
H51	Air transport services	0.00	0		
H52	Warehousing and support services for transportation	0.00	0		
I	Accommodation and food services	28.91	283	1.44	2.09
J58	Publishing services	41.87	110	1.35	2.32
J59_60	Motion picture, video and television programme production	4.35	20	1.19	2.18
J62_63	Computer programming, consultancy and related services;	0.43	3	1.50	2.67
K64	Financial services, except insurance and pension funding	100.94	288	1.74	2.58
K65	Insurance, reinsurance and pension funding services, except	6.40	23	1.61	2.42
M69_70	Legal and accounting services; services of head offices;	9.19	59	1.35	1.82
M72	Scientific research and development services	0.00	0		
M74_75	Other professional, scientific and technical services and	1.69	7	1.08	2.13
N77	Rental and leasing services	0.00	0		
N78	Employment services	0.00	0		
N79	Travel agency, tour operator and other reservation services	0.00	0		
N80-82	Security and investigation services; services to buildings	2.20	42	1.12	2.07
O	Public administration and defence services; compulsory	16.85	183	1.23	1.50
P	Education services	177.28	1,692	1.10	1.24
Q86	Human health services	8.26	91	1.22	1.49
Q87_88	Residential care services; social work services without	1.57	18	1.24	1.53
R90-92	Creative, arts, entertainment, library, archive, museum,	6.14	81	1.38	1.96
R93_1	Sport services	138.02	a	1.40	1.96
R93_2	Sporting services and amusement and recreation services	2.98	a	1.40	1.96
S95	Repair services of computers and personal and household	0.78	2	1.22	1.59

National Data Sheet
Latvia

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	0.03 bn €	0.12%
Narrow Definition	0.11 bn €	0.51%
Broad Definition	0.14 bn €	0.64%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	2,377	0.28%
Narrow Definition	10,457	1.23%
Broad Definition	12,611	1.48%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	0.00	0		
C10-12	Food, beverages and tobacco products	0.22	12	2.01	2.47
C13-15	Textiles, wearing apparel, leather and related products	2.82	326	1.45	1.93
C18	Printing and recording services	0.01	1	1.74	2.22
C19	Coke and refined petroleum products	0.00	0		
C21	Basic pharmaceutical products and pharmaceutical	1.65	55	1.38	1.94
C22	Rubber and plastic products	0.00	0		
C25	Fabricated metal products, except machinery & equipment	0.00	0		
C26	Computer, electronic and optical products	0.00	0		
C29	Motor vehicles, trailers and semi-trailers	0.89	18	1.71	2.37
C30	Other transport equipment	4.89	309	1.85	2.39
C31_32	Furniture and other manufactured goods	1.77	104	1.74	2.14
C33	Repair and installation services of machinery & equipment	1.83	131	1.87	2.24
F	Constructions and construction works	1.67	131	2.52	3.02
G45	Wholesale and retail trade and repair services of motor	0.02	2	1.73	1.90
G46	Wholesale trade services, except of motor vehicles and	5.62	130	1.98	2.22
G47	Retail trade services, except motor vehicles & motorcycles	5.83	487	1.56	1.72
H49	Land transport services and transport services via pipelines	0.66	29	1.79	2.22
H50	Water transport services	0.00	0		
H51	Air transport services	0.25	27	1.46	2.64
H52	Warehousing and support services for transportation	0.00	0		
I	Accommodation and food services	1.47	155	1.96	2.27
J58	Publishing services	0.81	31	1.95	2.38
J59_60	Motion picture, video and television programme production	0.00	0		
J62_63	Computer programming, consultancy and related services;	0.00	0		
K64	Financial services, except insurance and pension funding	0.71	34	1.61	1.93
K65	Insurance, reinsurance and pension funding services, except	0.07	2	1.72	1.87
M69_70	Legal and accounting services; services of head offices;	0.00	0		
M72	Scientific research and development services	0.26	2	1.25	1.31
M74_75	Other professional, scientific and technical services and	0.04	3	1.74	2.02
N77	Rental and leasing services	2.61	17	1.50	1.83
N78	Employment services	0.00	0		
N79	Travel agency, tour operator and other reservation services	0.72	52	2.10	2.73
N80-82	Security and investigation services; services to buildings	0.40	36	1.66	1.90
O	Public administration and defence services; compulsory	2.10	106	1.45	1.58
P	Education services	54.11	6,125	1.33	1.45
Q86	Human health services	0.40	34	1.34	1.64
Q87_88	Residential care services; social work services without	0.00	0		
R90-92	Creative, arts, entertainment, library, archive, museum,	20.51	1,610	1.61	1.78
R93_1	Sport services	26.88	2,377	1.84	2.06
R93_2	Sporting services and amusement and recreation services	2.53	232	1.84	2.07
S95	Repair services of computers and personal and household	0.23	33	1.86	2.26

National Data Sheet
Malta

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	0.02 bn €	0.24%
Narrow Definition	0.07 bn €	0.99%
Broad Definition	0.13 bn €	1.81%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	a	a
Narrow Definition	2,292	1.37%
Broad Definition	3,306	1.98%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	0.55	8	1.47	1.72
C10-12	Food, beverages and tobacco products	0.34	13	1.40	1.92
C13-15	Textiles, wearing apparel, leather and related products	1.20	0	1.12	1.55
C18	Printing and recording services	0.00	0		
C19	Coke and refined petroleum products	0.00	0		
C21	Basic pharmaceutical products and pharmaceutical	0.00	0		
C22	Rubber and plastic products	0.00	0		
C25	Fabricated metal products, except machinery & equipment	0.39	18	1.28	1.87
C26	Computer, electronic and optical products	0.00	0		
C29	Motor vehicles, trailers and semi-trailers	0.00	0		
C30	Other transport equipment	0.00	0		
C31_32	Furniture and other manufactured goods	0.00	0		
C33	Repair and installation services of machinery & equipment	0.42	9	1.28	1.84
F	Constructions and construction works	6.29	188	1.56	1.97
G45	Wholesale and retail trade and repair services of motor	1.29	45	1.34	1.63
G46	Wholesale trade services, except of motor vehicles and	10.55	208	1.31	1.50
G47	Retail trade services, except motor vehicles & motorcycles	8.57	359	1.34	1.50
H49	Land transport services and transport services via pipelines	0.00	0		
H50	Water transport services	0.30	11	1.73	2.21
H51	Air transport services	0.00	0		
H52	Warehousing and support services for transportation	1.62	23	1.45	1.74
I	Accommodation and food services	11.83	456	1.53	1.89
J58	Publishing services	2.91	60	1.26	1.60
J59_60	Motion picture, video and television programme production	0.00	0		
J62_63	Computer programming, consultancy and related services;	0.00	0		
K64	Financial services, except insurance and pension funding	6.51	86	1.03	1.86
K65	Insurance, reinsurance and pension funding services, except	1.08	13	1.14	1.64
M69_70	Legal and accounting services; services of head offices;	2.16	38	1.32	1.50
M72	Scientific research and development services	0.00	0		
M74_75	Other professional, scientific and technical services and	0.24	8	1.43	1.89
N77	Rental and leasing services	0.85	9	1.53	1.91
N78	Employment services	0.86	11	1.15	1.24
N79	Travel agency, tour operator and other reservation services	1.14	12	1.58	2.01
N80-82	Security and investigation services; services to buildings	0.00	0		
O	Public administration and defence services; compulsory	3.12	100	1.20	1.40
P	Education services	21.27	869	1.12	1.19
Q86	Human health services	1.65	48	1.13	1.31
Q87_88	Residential care services; social work services without	1.66	74	1.14	1.28
R90-92	Creative, arts, entertainment, library, archive, museum,	24.46	122	1.10	2.03
R93_1	Sport services	17.54	a	1.48	1.75
R93_2	Sporting services and amusement and recreation services	0.56	a	1.48	1.73
S95	Repair services of computers and personal and household	0.07	1	1.21	1.51

European Commission | Sport

National Data Sheet
Netherlands

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	1.59 bn €	0.25%
Narrow Definition	5.38 bn €	0.83%
Broad Definition	7.97 bn €	1.24%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	49,181	0.67%
Narrow Definition	107,248	1.45%
Broad Definition	150,687	2.04%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	25.94	472	1.91	2.32
C10-12	Food, beverages and tobacco products	45.24	380	1.85	2.47
C13-15	Textiles, wearing apparel, leather and related products	3.30	42	1.68	2.22
C18	Printing and recording services	4.77	73	1.57	2.10
C19	Coke and refined petroleum products	5.40	31	1.24	2.46
C21	Basic pharmaceutical products and pharmaceutical	8.29	45	1.47	1.89
C22	Rubber and plastic products	7.43	81	1.65	2.34
C25	Fabricated metal products, except machinery & equipment	17.96	207	1.74	2.21
C26	Computer, electronic and optical products	11.57	93	1.34	2.52
C29	Motor vehicles, trailers and semi-trailers	5.22	49	1.62	2.48
C30	Other transport equipment	5.10	64	1.82	2.40
C31_32	Furniture and other manufactured goods	16.63	408	1.56	1.92
C33	Repair and installation services of machinery & equipment	9.10	47	1.81	2.26
F	Constructions and construction works	91.38	1,163	1.91	2.30
G45	Wholesale and retail trade and repair services of motor	163.06	2,446	1.62	1.98
G46	Wholesale trade services, except of motor vehicles and	1,000.77	5,324	1.51	1.78
G47	Retail trade services, except motor vehicles & motorcycles	559.13	17,222	1.53	1.71
H49	Land transport services and transport services via pipelines	61.91	892	1.71	2.05
H50	Water transport services	10.74	78	1.47	2.50
H51	Air transport services	12.19	140	1.65	2.58
H52	Warehousing and support services for transportation	45.00	274	1.68	1.99
I	Accommodation and food services	715.47	21,445	1.63	1.98
J58	Publishing services	318.09	4,664	1.69	1.98
J59_60	Motion picture, video and television programme production	4.96	61	1.74	2.06
J62_63	Computer programming, consultancy and related services;	94.47	961	1.56	1.81
K64	Financial services, except insurance and pension funding	28.89	95	1.30	1.58
K65	Insurance, reinsurance and pension funding services, except	10.20	53	1.68	1.90
M69_70	Legal and accounting services; services of head offices;	23.83	181	1.66	2.00
M72	Scientific research and development services	2.08	24	1.50	1.85
M74_75	Other professional, scientific and technical services and	2.42	40	1.63	2.00
N77	Rental and leasing services	5.33	16	1.53	1.75
N78	Employment services	12.30	77	1.28	1.41
N79	Travel agency, tour operator and other reservation services	2.00	18	1.77	2.46
N80-82	Security and investigation services; services to buildings	7.63	133	1.46	1.67
O	Public administration and defence services; compulsory	948.02	9,213	1.54	1.70
P	Education services	1,716.52	27,963	1.26	1.34
Q86	Human health services	311.23	5,674	1.35	1.56
Q87_88	Residential care services; social work services without	22.56	607	1.36	1.51
R90-92	Creative, arts, entertainment, library, archive, museum,	40.62	689	1.57	1.79
R93_1	Sport services	1,592.91	49,181	1.73	2.00
R93_2	Sporting services and amusement and recreation services	2.51	51	1.71	2.02
S95	Repair services of computers and personal and household	0.35	8	1.56	1.98

National Data Sheet
Poland

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	1.11 bn €	0.29%
Narrow Definition	6.52 bn €	1.67%
Broad Definition	8.95 bn €	2.30%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	51,938	0.34%
Narrow Definition	250,828	1.64%
Broad Definition	332,939	2.17%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	7.63	1,012	1.95	2.15
C10-12	Food, beverages and tobacco products	0.00	0		
C13-15	Textiles, wearing apparel, leather and related products	415.61	26,316	1.36	1.76
C18	Printing and recording services	0.00	0		
C19	Coke and refined petroleum products	0.00	0		
C21	Basic pharmaceutical products and pharmaceutical	163.48	3,810	1.72	2.06
C22	Rubber and plastic products	0.00	0		
C25	Fabricated metal products, except machinery & equipment	181.90	6,421	1.78	2.26
C26	Computer, electronic and optical products	0.00	0		
C29	Motor vehicles, trailers and semi-trailers	0.00	0		
C30	Other transport equipment	326.33	15,596	1.81	2.47
C31_32	Furniture and other manufactured goods	168.78	8,413	1.81	2.21
C33	Repair and installation services of machinery & equipment	1.58	37	1.75	2.11
F	Constructions and construction works	1,467.07	38,772	1.97	2.27
G45	Wholesale and retail trade and repair services of motor	0.00	0		
G46	Wholesale trade services, except of motor vehicles and	0.00	0		
G47	Retail trade services, except motor vehicles & motorcycles	0.00	0		
H49	Land transport services and transport services via pipelines	0.17	5	1.65	1.75
H50	Water transport services	0.00	0		
H51	Air transport services	0.00	0		
H52	Warehousing and support services for transportation	0.00	0		
I	Accommodation and food services	118.64	5,507	1.81	1.99
J58	Publishing services	38.16	519	1.55	1.76
J59_60	Motion picture, video and television programme production	17.89	371	1.90	2.14
J62_63	Computer programming, consultancy and related services;	0.00	0		
K64	Financial services, except insurance and pension funding	0.00	0		
K65	Insurance, reinsurance and pension funding services, except	0.00	0		
M69_70	Legal and accounting services; services of head offices;	0.00	0		
M72	Scientific research and development services	120.18	1,424	1.00	1.00
M74_75	Other professional, scientific and technical services and	0.00	0		
N77	Rental and leasing services	0.00	0		
N78	Employment services	0.00	0		
N79	Travel agency, tour operator and other reservation services	547.54	9,884	1.83	2.15
N80-82	Security and investigation services; services to buildings	0.00	0		
O	Public administration and defence services; compulsory	170.48	5,416	1.01	1.05
P	Education services	1,668.62	78,814	1.24	1.28
Q86	Human health services	154.76	6,052	1.02	1.11
Q87_88	Residential care services; social work services without	127.83	5,658	1.00	1.00
R90-92	Creative, arts, entertainment, library, archive, museum,	1,275.74	54,594	1.70	1.81
R93_1	Sport services	1,112.88	51,938	1.94	2.15
R93_2	Sporting services and amusement and recreation services	0.00	0		
S95	Repair services of computers and personal and household	867.21	12,379	1.29	1.44

European Commission | Sport

National Data Sheet
Portugal

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	0.58 bn €	0.34%
Narrow Definition	1.57 bn €	0.93%
Broad Definition	1.88 bn €	1.12%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	12,321	0.29%
Narrow Definition	53,255	1.25%
Broad Definition	59,330	1.39%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	0.50	83	1.78	2.17
C10-12	Food, beverages and tobacco products	1.34	23	1.96	2.70
C13-15	Textiles, wearing apparel, leather and related products	197.22	7,934	1.57	2.12
C18	Printing and recording services	1.41	45	1.57	2.02
C19	Coke and refined petroleum products	0.00	0		
C21	Basic pharmaceutical products and pharmaceutical	0.00	0		
C22	Rubber and plastic products	0.86	14	1.49	2.33
C25	Fabricated metal products, except machinery & equipment	22.86	908	1.76	2.36
C26	Computer, electronic and optical products	0.00	0		
C29	Motor vehicles, trailers and semi-trailers	0.07	2	1.45	2.88
C30	Other transport equipment	56.10	3,073	1.57	2.47
C31_32	Furniture and other manufactured goods	30.47	1,368	1.65	2.26
C33	Repair and installation services of machinery & equipment	3.17	63	1.63	2.09
F	Constructions and construction works	55.47	1,042	2.12	2.49
G45	Wholesale and retail trade and repair services of motor	5.13	264	1.68	2.32
G46	Wholesale trade services, except of motor vehicles and	2.74	39	1.74	1.95
G47	Retail trade services, except motor vehicles & motorcycles	214.25	11,811	1.77	1.91
H49	Land transport services and transport services via pipelines	0.26	12	1.60	1.68
H50	Water transport services	0.01	0	2.01	2.19
H51	Air transport services	1.24	13	1.63	2.17
H52	Warehousing and support services for transportation	0.03	1	1.43	1.50
I	Accommodation and food services	8.06	343	1.88	2.27
J58	Publishing services	20.80	164	1.65	1.88
J59_60	Motion picture, video and television programme production	155.85	1,375	1.47	1.69
J62_63	Computer programming, consultancy and related services;	14.36	67	1.40	1.49
K64	Financial services, except insurance and pension funding	0.05	1	1.40	1.47
K65	Insurance, reinsurance and pension funding services, except	0.56	11	1.50	1.55
M69_70	Legal and accounting services; services of head offices;	36.32	1,617	1.51	1.59
M72	Scientific research and development services	0.95	5	1.41	1.47
M74_75	Other professional, scientific and technical services and	0.49	52	1.54	1.70
N77	Rental and leasing services	9.30	111	1.94	2.13
N78	Employment services	0.00	0		
N79	Travel agency, tour operator and other reservation services	3.11	355	2.22	2.47
N80-82	Security and investigation services; services to buildings	24.38	3,410	1.87	2.09
O	Public administration and defence services; compulsory	40.49	518	1.21	1.26
P	Education services	377.77	11,556	1.10	1.12
Q86	Human health services	3.69	110	1.54	1.89
Q87_88	Residential care services; social work services without	4.44	261	1.56	1.84
R90-92	Creative, arts, entertainment, library, archive, museum,	7.32	321	1.56	1.73
R93_1	Sport services	576.46	12,321	1.85	2.03
R93_2	Sporting services and amusement and recreation services	0.50	21	1.85	2.06
S95	Repair services of computers and personal and household	0.59	15	1.31	1.45

European Commission | Sport

National Data Sheet
Romania

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	0.18 bn €	0.13%
Narrow Definition	1.20 bn €	0.90%
Broad Definition	1.39 bn €	1.04%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	11,867	0.14%
Narrow Definition	90,203	1.10%
Broad Definition	100,279	1.22%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	2.60	889	1.73	1.99
C10-12	Food, beverages and tobacco products	1.41	32	1.87	2.14
C13-15	Textiles, wearing apparel, leather and related products	157.45	18,718	1.70	1.98
C18	Printing and recording services	1.58	26	1.65	1.83
C19	Coke and refined petroleum products	3.76	54	1.80	2.20
C21	Basic pharmaceutical products and pharmaceutical	4.80	131	1.67	1.95
C22	Rubber and plastic products	30.81	1,692	1.83	2.32
C25	Fabricated metal products, except machinery & equipment	0.79	56	1.74	1.92
C26	Computer, electronic and optical products	0.38	28	1.73	1.84
C29	Motor vehicles, trailers and semi-trailers	113.84	6,165	1.94	2.52
C30	Other transport equipment	39.67	2,512	1.76	2.19
C31_32	Furniture and other manufactured goods	61.64	8,224	1.88	2.22
C33	Repair and installation services of machinery & equipment	3.07	153	1.51	1.67
F	Constructions and construction works	20.57	1,052	1.90	2.25
G45	Wholesale and retail trade and repair services of motor	1.50	133	1.77	2.00
G46	Wholesale trade services, except of motor vehicles and	75.88	2,536	2.00	2.27
G47	Retail trade services, except motor vehicles & motorcycles	70.56	10,080	1.91	2.16
H49	Land transport services and transport services via pipelines	4.99	207	1.75	2.07
H50	Water transport services	5.68	89	1.49	1.67
H51	Air transport services	2.79	68	1.91	2.15
H52	Warehousing and support services for transportation	5.53	57	1.73	1.88
I	Accommodation and food services	42.01	2,775	1.52	1.69
J58	Publishing services	40.06	2,440	1.69	2.08
J59_60	Motion picture, video and television programme production	0.29	25	2.05	2.28
J62_63	Computer programming, consultancy and related services;	12.59	202	1.52	1.76
K64	Financial services, except insurance and pension funding	1.41	39	1.49	1.59
K65	Insurance, reinsurance and pension funding services, except	1.50	88	1.82	2.07
M69_70	Legal and accounting services; services of head offices;	1.45	53	1.86	2.03
M72	Scientific research and development services	0.65	12	1.48	1.55
M74_75	Other professional, scientific and technical services and	0.44	25	1.88	2.05
N77	Rental and leasing services	1.08	12	1.77	1.96
N78	Employment services	1.65	17	1.73	1.89
N79	Travel agency, tour operator and other reservation services	3.95	78	2.28	2.54
N80-82	Security and investigation services; services to buildings	1.06	106	1.75	1.94
O	Public administration and defence services; compulsory	21.13	1,745	1.33	1.42
P	Education services	440.19	25,883	1.27	1.36
Q86	Human health services	19.17	1,359	1.41	1.61
Q87_88	Residential care services; social work services without	0.38	212	1.37	1.42
R90-92	Creative, arts, entertainment, library, archive, museum,	11.48	241	1.41	1.58
R93_1	Sport services	175.57	11,867	1.81	2.22
R93_2	Sporting services and amusement and recreation services	2.16	149	1.80	2.09
S95	Repair services of computers and personal and household	1.31	49	1.54	1.66

European Commission | Sport

National Data Sheet
Sweden

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	2.06 bn €	0.49%
Narrow Definition	4.63 bn €	1.09%
Broad Definition	5.95 bn €	1.41%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	43,737	0.97%
Narrow Definition	92,866	2.07%
Broad Definition	109,191	2.43%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	2.54	79	1.98	2.39
C10-12	Food, beverages and tobacco products	5.28	44	1.84	2.34
C13-15	Textiles, wearing apparel, leather and related products	23.08	363	1.45	1.99
C18	Printing and recording services	11.68	176	1.88	2.17
C19	Coke and refined petroleum products	5.41	9	1.08	2.50
C21	Basic pharmaceutical products and pharmaceutical	0.00	0		
C22	Rubber and plastic products	13.14	138	1.49	1.96
C25	Fabricated metal products, except machinery & equipment	3.48	40	1.66	2.04
C26	Computer, electronic and optical products	13.91	109	1.43	1.77
C29	Motor vehicles, trailers and semi-trailers	109.49	1,100	1.62	2.20
C30	Other transport equipment	79.83	855	1.45	1.84
C31_32	Furniture and other manufactured goods	335.61	4,019	1.52	1.95
C33	Repair and installation services of machinery & equipment	9.40	92	1.54	1.94
F	Constructions and construction works	15.39	199	1.63	1.92
G45	Wholesale and retail trade and repair services of motor	12.81	22	1.42	1.64
G46	Wholesale trade services, except of motor vehicles and	0.00	0		
G47	Retail trade services, except motor vehicles & motorcycles	0.00	0		
H49	Land transport services and transport services via pipelines	8.68	84	1.55	1.75
H50	Water transport services	6.39	55	1.52	2.02
H51	Air transport services	13.23	75	1.36	1.93
H52	Warehousing and support services for transportation	0.00	0		
I	Accommodation and food services	388.26	7,200	1.65	1.92
J58	Publishing services	430.17	3,510	1.59	1.78
J59_60	Motion picture, video and television programme production	85.41	856	1.78	2.09
J62_63	Computer programming, consultancy and related services;	3.03	22	1.50	1.70
K64	Financial services, except insurance and pension funding	29.30	131	1.38	1.47
K65	Insurance, reinsurance and pension funding services, except	31.58	203	1.40	1.50
M69_70	Legal and accounting services; services of head offices;	8.68	108	1.53	1.75
M72	Scientific research and development services	6.09	21	1.47	1.74
M74_75	Other professional, scientific and technical services and	2.28	45	1.72	1.96
N77	Rental and leasing services	3.04	4	1.45	1.69
N78	Employment services	3.53	64	1.36	1.50
N79	Travel agency, tour operator and other reservation services	24.41	144	1.55	1.94
N80-82	Security and investigation services; services to buildings	9.20	152	1.51	1.69
O	Public administration and defence services; compulsory	189.26	2,729	1.48	1.61
P	Education services	1,819.15	40,016	1.40	1.48
Q86	Human health services	148.65	1,984	1.34	1.49
Q87_88	Residential care services; social work services without	8.39	160	1.27	1.33
R90-92	Creative, arts, entertainment, library, archive, museum,	11.34	178	1.66	1.80
R93_1	Sport services	2,055.13	43,737	1.71	1.88
R93_2	Sporting services and amusement and recreation services	20.15	437	1.70	1.89
S95	Repair services of computers and personal and household	2.99	31	1.39	1.67

European Commission | Sport

National Data Sheet
Slovenia

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	0.05 bn €	0.14%
Narrow Definition	0.51 bn €	1.41%
Broad Definition	0.61 bn €	1.69%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	2,192	0.24%
Narrow Definition	18,899	2.10%
Broad Definition	21,916	2.43%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	3.67	436	1.71	2.18
C10-12	Food, beverages and tobacco products	0.70	17	1.79	2.32
C13-15	Textiles, wearing apparel, leather and related products	0.84	44	1.58	2.19
C18	Printing and recording services	0.35	15	1.87	2.25
C19	Coke and refined petroleum products	0.00	0		
C21	Basic pharmaceutical products and pharmaceutical	7.16	84	1.65	1.95
C22	Rubber and plastic products	6.59	210	1.48	2.25
C25	Fabricated metal products, except machinery & equipment	5.81	288	1.87	2.39
C26	Computer, electronic and optical products	0.49	15	1.53	1.97
C29	Motor vehicles, trailers and semi-trailers	0.54	14	1.43	2.47
C30	Other transport equipment	1.44	56	1.80	2.64
C31_32	Furniture and other manufactured goods	16.06	596	1.55	2.18
C33	Repair and installation services of machinery & equipment	1.20	30	1.44	1.76
F	Constructions and construction works	7.39	184	2.15	2.63
G45	Wholesale and retail trade and repair services of motor	0.57	18	1.57	1.88
G46	Wholesale trade services, except of motor vehicles and	38.76	378	1.68	1.99
G47	Retail trade services, except motor vehicles & motorcycles	57.87	2,553	1.49	1.62
H49	Land transport services and transport services via pipelines	9.83	257	1.69	2.12
H50	Water transport services	0.43	1	1.34	2.11
H51	Air transport services	0.21	7	1.87	2.50
H52	Warehousing and support services for transportation	0.53	10	1.76	2.02
I	Accommodation and food services	27.88	1,270	1.60	2.05
J58	Publishing services	0.85	18	1.86	2.20
J59_60	Motion picture, video and television programme production	2.01	59	1.76	1.99
J62_63	Computer programming, consultancy and related services;	0.58	13	1.53	1.77
K64	Financial services, except insurance and pension funding	7.75	116	1.43	1.54
K65	Insurance, reinsurance and pension funding services, except	1.77	46	1.66	1.79
M69_70	Legal and accounting services; services of head offices;	0.63	13	1.51	1.72
M72	Scientific research and development services	0.83	5	1.29	1.47
M74_75	Other professional, scientific and technical services and	3.20	32	1.24	1.41
N77	Rental and leasing services	2.90	2	1.39	1.61
N78	Employment services	0.89	2	1.14	1.19
N79	Travel agency, tour operator and other reservation services	5.76	211	1.61	2.08
N80-82	Security and investigation services; services to buildings	0.62	31	1.42	1.63
O	Public administration and defence services; compulsory	4.01	103	1.41	1.56
P	Education services	248.08	9,564	1.22	1.36
Q86	Human health services	38.35	872	1.29	1.54
Q87_88	Residential care services; social work services without	41.46	1,774	1.31	1.48
R90-92	Creative, arts, entertainment, library, archive, museum,	3.77	91	1.42	1.58
R93_1	Sport services	50.62	2,192	1.80	2.13
R93_2	Sporting services and amusement and recreation services	6.45	274	1.80	2.11
S95	Repair services of computers and personal and household	0.52	16	1.42	1.78

European Commission | Sport

National Data Sheet
Slovakia

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	0.10 bn €	0.14%
Narrow Definition	0.63 bn €	0.87%
Broad Definition	0.96 bn €	1.31%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	6,863	0.30%
Narrow Definition	32,980	1.42%
Broad Definition	47,095	2.03%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	0.44	20	1.64	2.16
C10-12	Food, beverages and tobacco products	1.74	58	1.84	2.51
C13-15	Textiles, wearing apparel, leather and related products	69.25	3,542	1.36	1.90
C18	Printing and recording services	0.80	46	1.57	2.13
C19	Coke and refined petroleum products	10.07	74	1.24	1.41
C21	Basic pharmaceutical products and pharmaceutical	1.63	23	1.53	1.95
C22	Rubber and plastic products	19.48	815	1.61	2.37
C25	Fabricated metal products, except machinery & equipment	0.42	14	1.57	2.04
C26	Computer, electronic and optical products	0.69	21	1.49	2.17
C29	Motor vehicles, trailers and semi-trailers	26.11	1,068	1.56	2.92
C30	Other transport equipment	10.12	328	1.49	2.17
C31_32	Furniture and other manufactured goods	26.50	1,392	1.62	2.10
C33	Repair and installation services of machinery & equipment	15.81	274	1.64	2.05
F	Constructions and construction works	23.33	812	1.86	2.26
G45	Wholesale and retail trade and repair services of motor	12.47	402	1.52	1.78
G46	Wholesale trade services, except of motor vehicles and	57.31	857	1.56	1.82
G47	Retail trade services, except motor vehicles & motorcycles	63.63	3,236	1.57	1.80
H49	Land transport services and transport services via pipelines	73.56	2,781	1.58	1.78
H50	Water transport services	0.57	31	1.72	1.89
H51	Air transport services	0.50	14	1.52	1.80
H52	Warehousing and support services for transportation	1.23	31	2.54	2.85
I	Accommodation and food services	61.71	5,955	1.60	1.94
J58	Publishing services	32.92	890	1.57	2.07
J59_60	Motion picture, video and television programme production	2.45	62	1.79	2.04
J62_63	Computer programming, consultancy and related services;	1.21	27	1.52	1.63
K64	Financial services, except insurance and pension funding	3.30	55	1.45	1.58
K65	Insurance, reinsurance and pension funding services, except	0.74	26	2.00	2.29
M69_70	Legal and accounting services; services of head offices;	3.22	72	1.53	1.65
M72	Scientific research and development services	2.23	35	1.36	1.51
M74_75	Other professional, scientific and technical services and	0.57	11	1.58	1.71
N77	Rental and leasing services	0.62	3	1.54	1.66
N78	Employment services	1.65	15	1.27	1.34
N79	Travel agency, tour operator and other reservation services	0.68	26	2.20	2.69
N80-82	Security and investigation services; services to buildings	0.59	38	1.55	1.67
O	Public administration and defence services; compulsory	105.50	3,511	1.36	1.50
P	Education services	193.05	11,700	1.32	1.43
Q86	Human health services	3.21	184	1.47	1.65
Q87_88	Residential care services; social work services without	3.31	512	1.51	1.76
R90-92	Creative, arts, entertainment, library, archive, museum,	16.70	259	1.30	1.36
R93_1	Sport services	102.46	6,863	1.79	2.14
R93_2	Sporting services and amusement and recreation services	0.85	858	1.79	2.00
S95	Repair services of computers and personal and household	2.93	153	1.24	1.46

National Data Sheet

United Kingdom

ECONOMIC IMPACT OF SPORT (according to the Vilnius Definition)

GROSS DOMESTIC PRODUCT

	Direct Effects	% of total
Core Definition	6.02 bn €	0.36%
Narrow Definition	22.21 bn €	1.31%
Broad Definition	36.75 bn €	2.18%

EMPLOYMENT

	Direct Effects	% of total
Core Definition	130,726	0.46%
Narrow Definition	643,728	2.27%
Broad Definition	1,064,939	3.75%

DETAILED INFORMATION on SECTORAL LEVEL

CPA	Description	Sport		Sector-specific Multiplier	
		GDP m €	Employment	domestic	EU-wide
A01	Products of agriculture, hunting and related services	236.17	10,282	1.79	2.20
C10-12	Food, beverages and tobacco products	134.33	2,354	2.09	2.61
C13-15	Textiles, wearing apparel, leather and related products	530.01	16,435	1.48	1.92
C18	Printing and recording services	539.78	18,007	1.75	2.12
C19	Coke and refined petroleum products	359.36	4,303	1.31	1.48
C21	Basic pharmaceutical products and pharmaceutical	548.17	4,990	1.46	1.70
C22	Rubber and plastic products	63.43	1,955	1.53	1.95
C25	Fabricated metal products, except machinery & equipment	142.09	2,419	1.55	2.05
C26	Computer, electronic and optical products	19.99	526	1.70	2.13
C29	Motor vehicles, trailers and semi-trailers	140.53	3,107	1.85	2.56
C30	Other transport equipment	734.89	16,437	1.60	1.97
C31_32	Furniture and other manufactured goods	648.68	13,772	1.66	1.92
C33	Repair and installation services of machinery & equipment	247.85	6,725	1.71	2.09
F	Constructions and construction works	1,104.18	18,642	1.86	2.14
G45	Wholesale and retail trade and repair services of motor	237.88	6,743	1.51	1.74
G46	Wholesale trade services, except of motor vehicles and	1,599.67	35,063	1.73	1.95
G47	Retail trade services, except motor vehicles & motorcycles	5,323.60	202,271	1.61	1.77
H49	Land transport services and transport services via pipelines	392.68	8,421	1.64	1.84
H50	Water transport services	105.30	1,739	1.85	2.12
H51	Air transport services	270.93	2,478	1.54	1.71
H52	Warehousing and support services for transportation	21.10	456	1.90	2.09
I	Accommodation and food services	3,524.93	117,570	1.59	1.87
J58	Publishing services	445.88	8,076	1.68	1.87
J59_60	Motion picture, video and television programme production	2,061.20	32,772	1.64	1.84
J62_63	Computer programming, consultancy and related services;	443.23	7,057	1.42	1.55
K64	Financial services, except insurance and pension funding	39.92	356	1.62	1.78
K65	Insurance, reinsurance and pension funding services, except	132.13	564	1.81	1.99
M69_70	Legal and accounting services; services of head offices;	1,263.01	43,364	1.31	1.40
M72	Scientific research and development services	150.46	4,498	1.55	1.84
M74_75	Other professional, scientific and technical services and	466.63	37,800	1.42	1.55
N77	Rental and leasing services	23.55	461	1.52	1.71
N78	Employment services	59.80	1,919	1.66	1.82
N79	Travel agency, tour operator and other reservation services	322.52	7,322	1.65	1.77
N80-82	Security and investigation services; services to buildings	320.24	9,908	1.42	1.56
O	Public administration and defence services; compulsory	1,917.14	37,276	1.44	1.57
P	Education services	3,804.55	124,820	1.31	1.39
Q86	Human health services	661.29	16,047	1.33	1.44
Q87_88	Residential care services; social work services without	472.56	21,565	1.78	1.96
R90-92	Creative, arts, entertainment, library, archive, museum,	1,200.56	85,254	1.49	1.65
R93_1	Sport services	6,021.18	130,726	1.82	2.08
R93_2	Sporting services and amusement and recreation services	0.00	0		
S95	Repair services of computers and personal and household	18.78	456	1.38	1.53

Literature

Ahlert G. and an der Heiden I. (2015): Die ökonomische Bedeutung des Sports in Deutschland, Ergebnisse des Sportsatellitenkontos 2010, erste Schätzungen für 2012, Themenreport 2015/01, GWS mbH, Osnabrück.

Ambavis (2016): Economic impact of creating and exhibiting 3D objects for blind and visually impaired people in museums, project 2014-1-AT01-KA204-001014 funded by the European Commission through Erasmus+, downloadable at http://www.ambavis.eu/wp-content/uploads/2016/09/Economic-Aspects_final-disclaimer.pdf .

CBS (2015): De Nederlandse sporteconomie De bijdrage van sport aan de Nederlandse economie in 2006-2012, Centraal Bureau voor de Statistiek, CBS, Den Haag.

Coliped (2013): European Bicycle Market – 2013 edition – Industry & Market Profile (2012 statistics)

DCMS (2016): UK Sport Satellite Account, 2012, 2014 and 2015, Statistical Release, Department for Culture Media & Sport, London.

European Commission/EACEA/Eurydice (2013): Physical Education and Sport at School in Europe Eurydice Report. Luxembourg: Publications Office of the European Union.

Eurostat (2008): Eurostat Manual of Supply, Use and Input-Output Tables, Luxembourg.

Isard W. (1953): Regional Commodity Balances and Interregional Commodity Flows, American Economic Review 43 (1), S. 167 – 180.

Hewings G., Jensen C. (1986): Regional, Interregional and Multiregional Input-Output Analysis, in: Nijkon P. (Hrsg.) Handbook of Regional and Urban Economcis, V 1, S. 295 – 355, Amsterdam: North Holland.

Hübler O. (1979): Regionale Sektorstrukturen. Verfahren zur Schätzung und Auswertung regionaler Input-Output-Beziehungen, Beiträge zur angewandten Wirtschaftsforschung, Band 5, Duncker & Humblot Verlag, Berlin.

Leontief W. (1963): Die multiregionale Input-Output-Analyse, Arbeitsgemeinschaft für Forschung des Landes Nordrhein-Westfalen, Heft 123, Westdeutscher Verlag, Köln.

Liberda B., Tomaszewicz Ł., Świeczewska I., and Tręska J. (2015): Rachunek Satelitarny Sportu dla Polski za 2010 rok, Raport wykonany na zlecenie i ze środków budżetowych Ministerstwa Sportu i Turystyki, Warsaw.

Miller R.E., Blair P.D. (1985): Input-Output-Analysis: Foundations and Extensions, PrenticeHall.

Moses L. N. (1955): The Stability of Interregional Trading Patterns and Input-Output Analysis, The American Economic Review, Vol. XLV, Number 5, December.

SpEA, SIRC, HAN (2016): Study on national Sport Satellite Accounts (SSAs) in the EU, Study on behalf of the European Commission, DG EAC, downloadable at https://publications.europa.eu/en/publication-detail/-/publication/ca2a161e-9a91-11e6-9bca-01aa75ed71a1 .

SpEA, SIRC, Statistical Service of Republic of Cyprus, Meerwaarde Sport en Economie, FESI, Ministry of Sport and Tourism of the Republic of Poland (2012): Study on the Contribution of Sport to Economic Growth and Employment in the EU. Research Report. European Commission, Directorate-General Education and Culture.

Statistics Lithuania (2016): Sporto ekonominiai rodikliai 2015 m., sport-related indicators for 2015, Statistics Lithuania, downloadable at https://osp.stat.gov.lt/informaciniai-pranesimai?eventId=143461 .

Statistics Portugal (2016): Sport Satellite Account, downloadable at https://www.ine.pt/xportal/xmain?xpid=INE&xpgid=ine_cnacionais2010&contexto=cs&selTab=tab3&perfil=220677460&INST=220617355

HOW TO OBTAIN EU PUBLICATIONS

Free publications:

- one copy:
  via EU Bookshop (http://bookshop.europa.eu);
- more than one copy or posters/maps:
  from the European Union's representations (http://ec.europa.eu/represent_en.htm);
  from the delegations in non-EU countries (http://eeas.europa.eu/delegations/index_en.htm);
  by contacting the Europe Direct service (http://europa.eu/europedirect/index_en.htm) or
  calling 00 800 6 7 8 9 10 11 (freephone number from anywhere in the EU) (*).

  (*) The information given is free, as are most calls (though some operators, phone boxes or hotels may charge you).

Priced publications:

- via EU Bookshop (http://bookshop.europa.eu).

NC-05-17-238-EN-N

Publications Office

ISBN: 978-92-79-76925-2