

# Digital Technologies:

a Breakdown or a Breakthrough  
of the Music Market?



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## Between the Analog and the Digital Era

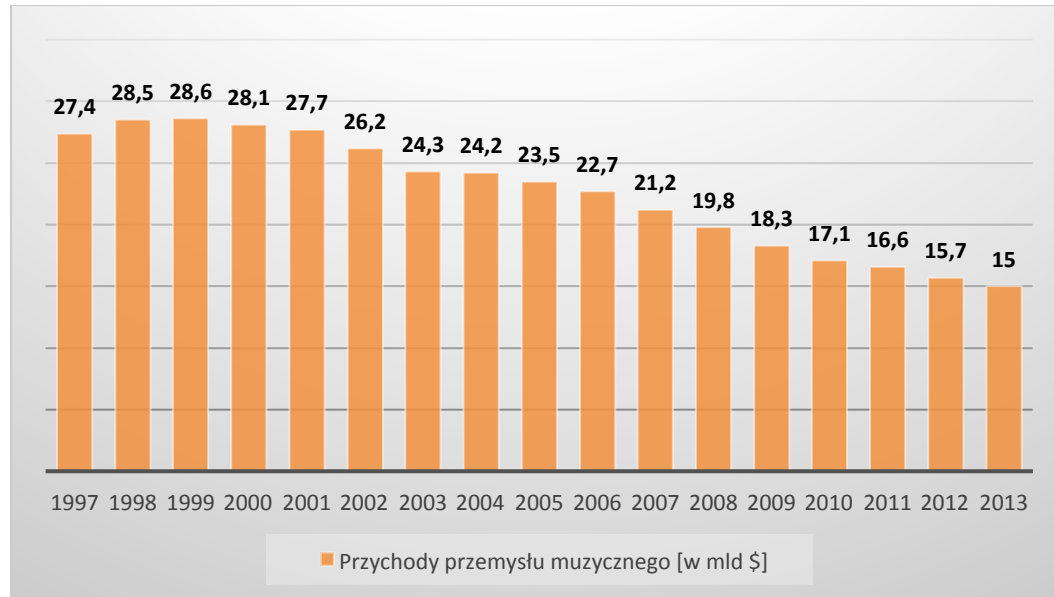
### The Crisis of Analog Sales Models

New consumer practices, technologies and the transformation of the actors at the music market result in prospects for the development of services based on new models of access to content, including artistic output. On the other hand, using such new prospects requires learning the needs and practices of consumers well as well as developing new approaches. And that requires time.

In the meantime, we are observing a decreasing trend in the commercialization of music. The global revenue of music businesses has been plummeting incessantly since 2000. A direct cause of the decrease of the music industry revenues is the collapse of trading in music content recorded on physical data storage media. This can be interpreted as a general demise of a model of the commercialization of music based on the sales of cassettes, and later CDs with recordings at music stores.

Since 1999 until today the global value of physical music media sold has fallen by over a half. Since around 2005 that vacuum has slowly been filled by the revenues from on-line music sales. This trend has been depicted in graphs 1. and 2.

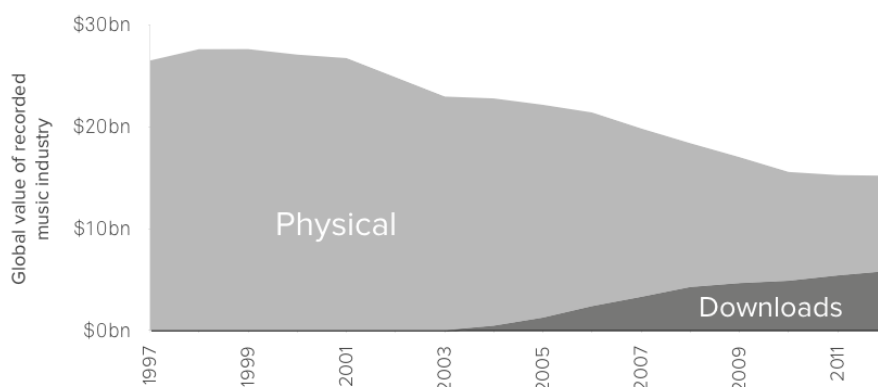
**Graph 1. World Music Industry Revenue in the Years 1997 - 2013**



Source: IFPI, *Recording industry in numbers 2014*, <http://rin.ifpi.org/rin>

World music industry revenue over the last 15 years has decreased by over \$ 13 billion. Today it is worth \$ 15 billion, while as early as in 2000 the total revenue in the industry was evaluated at \$ 28.1 billion. What is more, this is a nominal value of the fall in that market, i.e. not taking into account inflation at the time. There are two parallel phenomena visible in the music industry: a decrease in revenue and a change in its structure. The significance of digital sales channels is rising.

**Graph 2. Structure of the Music Industry Revenue as Divided into Physical Sales and Online Sales**



Source: *Spotify Explained*, <https://www.spotifyartists.com/spotify-explained/>

Digital sales appeared in the structure of the music industry revenue around the year 2003. Since then, the importance of this particular sales channel has been growing dynamically. Today, it reaches as much as several dozen percent of the music market share. According to various estimates, the revenue generated from both sources will match within the next few months.

The fact that consumers resigned from using physical media changed the music market. We used to buy a copy of a record available from the market in a limited number to a large extent controlled by the producer. Copying for one's own purposes posed no threat for the sales and illegal commercial copying was easier to stop, as it involved physical media.

Downloading digital files has been disruptive to the recorded music market, which found its expression already in 2001 in a lawsuit resulting in the closing down of Napster – the first Internet peer-to-peer service which gained such a popularity enabling its users to share and download music files free of charge. The success of the service, which had 80 million registered users<sup>1</sup> at its peak was possible owing to exactly the opposite features: the reproduction of a digital file is out of control of a producer and results in an unlimited number of copies perfectly mirroring the original in a very short period of time and practically at no cost.

### **CCSs in transition**

The commercialization of music involves not only direct sales, but also copyright-based revenue. Royalties are collected by so-called Copyright Collection Societies (CCSs) which represent creators and owners of copyrights in musical works – only in Europe there is approx. 200 organizations of such kind and their turnover reaches approx. 4,8 billion Euro annually.

In Poland income from royalties is especially important for the music industry. According to the calculations of the Polish Society of the Phonographic Industry (Polish: ZPAV) the sales value of music recorded on physical media in 2014 amounted to PLN 279 million (66 million euro), while digital channels brought revenues of PLN 69 million (16.5 million euro). In total, that results in the total amount of PLN 348 million (82.5 million euro). At the same time, when analyzing public financial statements of Copyright Collection Societies with

respect to the music recording industry (ZAiKS, STOART, SAWP and ZPAV), we learn that in 2013 they transferred to copyright owners PLN 480.3 million (115 million euro)<sup>2</sup>. This is by 38% more than the phonographic industry had earned through direct sales.

The system of collective copyright management originates from the analog times, and the development of technology so far has not exerted any greater impact on its organization. On the one hand, it is based on a points system of royalty distribution including the mass media, the radio and television, as the main fields of exploitation. They determine money distribution on a wider scale. Such a model awards artists frequently exploited on the radio and television. They are allocated a large number of points, which are later extended on all royalties designated for distribution. However, if an entity playing musical works delivers their list to a CCS, then that CCS is obliged to distribute the royalties in accordance with that list. It is true that services such as Spotify also make settlements with CCSs, however, the extent these sources of revenue affect the distribution of all royalties, remains unknown<sup>3</sup>.

Copyrights owners, that is the main interestholders of CCSs, are also serviced in a system which is a relic of the analog era. For instance, in order to submit a work to become protected, it is necessary to fill in a physical form along with a personally signed printout of sheet music<sup>4</sup>. Certainly, it would be possible to streamline these procedures, by introducing, for example, a possibility to submit digital files instead of such musical notation, as promised by ZAiKS, the largest Polish CCS.

However, the most important thing is that the "analog nature" of the system of collective copyrights management evinces in perceiving the role of copyright collection societies as "conveyor belts", transferring cash from one market segment to another. That was fully justified during the times when there was no web or the digital traces that we leave online, which made it difficult to effectively find rights' owners. However, today, owing to electronic payment systems and social media, artists collect considerable funds for their artistic activity directly from their audience and very often for activities (like recording an album), which will take place only after the necessary amount has been collected<sup>5</sup>. There are no grounds to think that royalties' collection could not be completed in a similar way.

Being a collective cashier is a role whose exceptionality will dwindle. And consequently, the so understood role of collective management will be less attuned to the needs of artists and less understood by users of culture who, having the choice to support an artist directly or through an intermediary, are also equipped with the appropriate digital tools to choose the former option.

## **Chances and Challenges of the Digital Era**

### **Chances for New Intermediaries**

The music market has already started to learn how to commercialize music in the digital world on a global scale. Presently, digital intermediaries sell not so much "a digital copy", but a license to access a file, which may be reproduced only in a specific way. We can also use a streaming access offering the possibility to listen to music in the framework of a given service without the possibility to download and reproduce it.

Economic forecasts for the music branch show four main directions of music commercialization: (1) physical media sales, (2) sound files sales, (3) streaming, (4) and

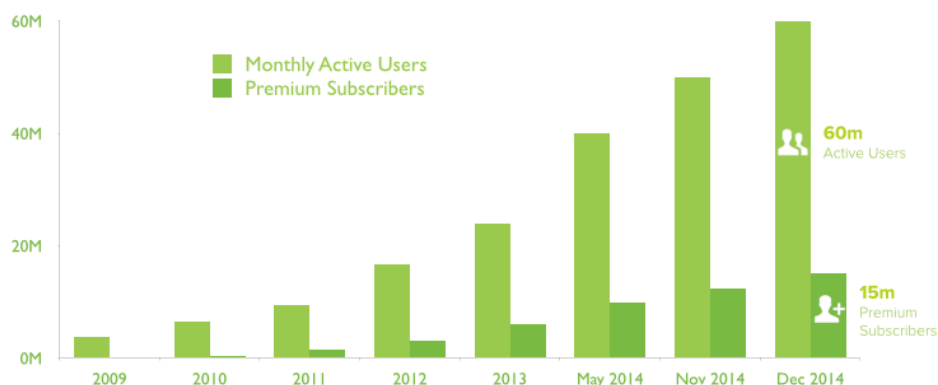
mobile platforms. According to the forecast by PWC, in 2018 the globally measured trading in music files will be equal to the physical trade, which will constitute merely 1/3 of the entire commercialization of digital music<sup>6</sup>.

Free access to music reproduced digitally is indeed very attractive for consumers, however, it is not true that they do not want to support artists<sup>7</sup>. This study describes examples of services offering paid access to music. They show how to efficiently commercialize music using digital technologies.

In 2003 an iTunes shop was open which - as calculated by the Billboard magazine - at the end of 2012 sold 6.9 billion dollars worth of music recordings, which constituted 75% of the entire global market of paid downloads at the time. Until today, iTunes has remained a music files market powerhouse, with 800 million registered users at the end of 1st quarter of 2014<sup>8</sup>. Its success is possible owing to the strategy adopted by Steve Jobs, who offered to iTunes' users an opportunity to buy a single track for less than a dollar in order to compete with the availability of free files on the web.

Spotify is a streaming service formed in Sweden in 2008, which also allows for a social-media discovery of music through recommendations and lists of friends<sup>9</sup>. In its free, basic version, access to music on demand is limited by the necessity to listen to audio commercials. In 2009 it attracted approx. 2 million users. In its second year of operation their number doubled and the first premium tier subscribers appeared to pay a fixed charge for using the Spotify service free from adverts. They may also use their own playlists in offline mode or have access to music of an exceptional quality. Owing to that strategy, at the end of 2014 Spotify had on its platform over 20 million tracks, approx. 60 million active users, out of which 1/4 - i.e. 15 million are premium subscribers (graph 4.).

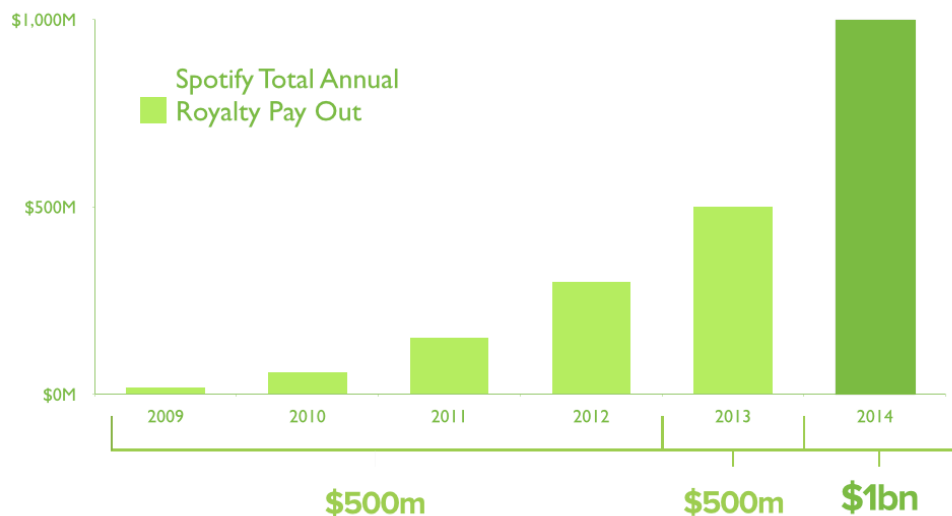
**Graph 3. Spotify Premium Subscribers against the Total Number of Users**



Source: *Spotify Explained*, <https://www.spotifyartists.com/spotify-explained/>

Spotify has so far paid out approx. 2 billion dollars to copyright owners of the music made available on its platform. At the same time, in the year 2014 only it paid out one half of that amount, which shows the dynamics, and at the same time the potential for development of this form of the commercialization of music (graph 5.).

**Graph 4. Payouts Made by Spotify for the Benefit of Copyrights Holders in Music Offered via this Service in the Years 2009 - 2014**



Source: *Spotify Explained*, <https://www.spotifyartists.com/spotify-explained/>

Independent Digital is a Polish company founded in 2002 which has yet another role on the market – it brings producers and artists together with services such as iTunes and Spotify, while representing over 140 independent record labels and individual creators. ID also cooperates with over 30 video licensors. Content is distributed worldwide in the form of downloadable files and through streaming, both in online services (i.e. iTunes, Deezer, WiMP, Spotify, Google Music) and in the services offered by digital telecommunications operators (i.a. Muzodajnia, Granie na czekanie, Czasoumilacz, Halogranie)<sup>10</sup>. Owing to that, music labels and artists do not enter into contracts with each service separately, but they only grant their license through the company.

The average increase in the financial turnover of Independent Digital between 2011 and 2014 is 29.5%, while the accumulated increase since the launch of its activity amounts to over 6000%. Such dynamics show the potential of the commercialization of music in digital channels. The company's income is derived from its commission on consumer income in particular services.

### **How does Transparency Affect the Commercialization of Music?**

By their very nature, digital technologies make it possible to precisely calculate whose music was played, how many times and by whom. All digital technologies – iTunes or Spotify – use the data to determine a percentage of the funds obtained from the market that should go to a given copyright owner. As Spotify underlines on its website: "When we pay a rights holder, we provide all the information needed to attribute royalties to each of their artists"<sup>11</sup>.

The services of Spotify and Independent Digital are built on the principle of availability of information for consumers, whenever it is not proprietary information or if it is not a subject to a non-disclosure agreement (NDA) with a third party. In the case of Spotify, transparency is a response to the charges that appeared in the media in 2013 and 2014 stating that artists receive too small a share of the money earned by the service offering their music<sup>12</sup>. Because of that, artists such as Thom Yorke or Taylor Swift withdrew their recordings from Spotify.

The controversy around this business model showed how complicated the revenue streams between the services, such as Spotify, music publishers and artists may be<sup>13</sup>. Some of the commentators highlighted that big labels signing NDAs with services later retain a large share of the funds<sup>14</sup>. As a consequence of that debate, Spotify disclosed that it transfers 70% of the money earned to the copyright owners and prepared a special service called Spotify Artists, explaining the model and presenting the revenue streams between the service and its consumers<sup>15</sup>.

Therefore, data availability became part of the service for the consumer who, apart from the regular verification of settlement accuracy, may gain a great deal of information of business significance. Not only does it help effectively manage the accounts basing on income forecasts, but also offers a potential to plan other business activities.

### **Efficiency of Income and Development Management**

Settlement models may be simple, as in the case of iTunes, which collects commission from each track sold. The calculation system of Spotify is a little bit more complicated, as each play-count accompanied by an advertisement is monetized; premium plays are also settled differently. Thus, it is a challenge to integrate several sources of income and to calculate a share connected with the specific music content. Therefore, Spotify created a special algorithm enabling to determine the amount disbursed to particular copyright owners. This algorithm takes into account the financial revenues in their entirety obtained in a given geographic territory and the ratio of the number of plays of a given track to all plays in a specific period. This is how the service established the rate earned by a given track. What is important – all the information is made available to any client of the service who may learn precisely how the curve of demand for his or her works is shaped, also geographically, and knows how his or her works make money.

Similarly, by making the consumer panel accessible, Independent Digital offers to each contractor direct access to information on payments and settlements. The company created a special panel, owing to which each consumer may see how much they earned in a particular service, and the countries in which his or her recipients are located.

With that information, the client may forecast revenues with greater probability, and music producers gain knowledge which type of music is popular at a given time. Additionally, when planning concert tours or promotional activities one may use the data provided by these services. The details on where an artist is gaining or losing popularity are easily accessible through a consumer panel and enable the planning of tours and promotional campaigns, which bear a lesser risk of incurring unnecessary costs.

### **An Agent That Does Not Alienate Recipients and Users**

In the ecosystem of music commercialization each of the intermediary agents described above fulfills a different, significant role. Hence, comparing them with one another has its limitations, arising from the unique function of each of them. Apart from the mechanics of functioning that is cashflow management, also the fact of being an intermediary between various actors of the market is a feature common for all these entities.

Whether the revenue streams are generated by sales, streaming fees or by royalties, the efficiency of the intermediaries and their public image affect the effectiveness of their efforts in the long term. The debate around Spotify shows how powerful the economy of



reputation is today. Not being trusted by artists will result in a narrower offer for the audience, hence, it is in the interest of the agent to make sure that the former are provided with reliable information on the manner of earning money and redistribution of profits.

Independent Digital focuses on the win-win model by associating their own profit with the success of the creator. Commission taken by ID depends on how many times actually the audience will come across the output of their consumer. It is the actual result that is rewarded, and not the workload or "effort".

Against that background, Polish Copyright Collection Societies do not look too good. First, as we prove in the analysis entitled "Polish Copyright Collection Societies and Their Financial Data"<sup>16</sup>, their reports fail to provide clear answers to many questions regarding their financial health, but also regarding decisions behind repartition value in a given year, the value of repartition costs, or types of outsourced services.

Second, in the context of the transparency of streams and repartition efficiency of CCSs it is important to answer the question of how these organizations calculate the so-called collection cost, which is their commission on servicing the remuneration collection on behalf of rights holders and subsequently the handing over of the collected funds to these entities. In their reports, CCSs declare that in a global perspective collection costs amount approx. to 20% of the funds collected<sup>17</sup>. However, it is not known if the organizations retain a commission calculated against money collected from the market or rather against the actual repartition value. If the former situation takes place, CCSs may be less determined to transfer the funds to authorized entities, since their commission is not linked with the efficiency in that scope.

Third, the system of calculating due royalties is quite complicated, as shown on the example of "Table of Fees for Playback of Works and the Subject Matters of Neighboring Rights" used by ZAiKS. An entrepreneur conducting e.g. a gastronomic business, when wanting to properly pay an applicable fee must specify in the first place to which of the three groups his or her business belongs (it may be, e.g. a restaurant and then it will fall within group A; if he or she runs e.g. an eatery, it will be qualified as group B; gastronomic services located in hotels fall under a separate group - group C). Next, the fee depends on two further factors – the number of seats in the facility and the size of the town where it is located. Moreover, the Regulations provide that if a facility is of an "increased standard or attractiveness"<sup>18</sup> and "it applies higher prices of services and goods", then 30% of the rate has to be added to the amount specified; similarly in the case of "locations attractive for tourists" during the "tourist season"<sup>19</sup>.

These fees are covered not only by owners of gastronomic facilities, but also of other services offered to the general public while music is played. It is not clear whether a service facility always profits commercially from playing the music, as it is not clear what the term "increased standard of a facility" means.

These issues are highly disputable and their resolutions more often than not antagonize all parties. There is an example of a loud "hairstylist case" of Marcin Węgrzynowski who won a lawsuit ZAiKS brought against him over royalties for the music played in his salon.<sup>20</sup> The comments around the issue demonstrate how many questions the public opinion has with regard to how ZAiKS functions, including their relations with small businesses. For those playing music has marginal business significance. It seems that in the eyes of at least some part of the society, such practices turn CCSs into relentless agents.

## Technology as a Tool for the Re-commercialization of Music

The development of technology, the changing practices of participants of culture and new market niches proved to be disruptive for the culture as we knew it in the 20<sup>th</sup> century. Simultaneously, the emerging music intermediation and commercialization models prove that the best answer to the "chaos" introduced by proliferation of new technologies may be the very technologies – skillfully adapted to the needs of creators and expectations of the audience.

The decline in the sales of physical media, with the simultaneous wave of free file sharing did not bring about an instant global bankruptcy of the music recording industry, or the artists themselves. Quite the contrary, it proved that participants of culture want to pay the artists, however, in a model different from the one applied so far. The rock group Iron Maiden earned most from their concerts in Latin America organized in the places where their music was most frequently downloaded through BitTorrent<sup>21</sup>. Not only that anecdote, but also research results show<sup>22</sup> that a black-and-white division into those who buy music and those who steal it is entirely outdated.

Time will tell which ideas described above on how to commercialize music will be the most successful ones. Artists are looking at streaming services with great interest and try to capitalize the profits better – Jay Z has recently announced that he bought Tidal, a streaming service, which will be owned by artists. He already attracted many stars, such as Madonna or Rihanna<sup>23</sup>.

It is very doubtful that 800 million users of iTunes and 60 million users of Spotify will massively return to buying albums and singles in a store. What is more, the expectations of availability, price and the "what I pay for and how much of that is distributed to my favorite artist" transparency will diffuse into different segments of the music market, including copyright collection.

If Copyright Collection Societies want to remain an important vantage point for the culture while it undergoes the process of re-commercialization and to manage their reputation responsibly, they should rethink their role in the copyright system. The development of social media and electronic payment services (including micropayments) and practically unlimited possibilities to search through the web and browsers diminish the significance of entities whose main goal is to collect royalties. With time, it will be a role easily replaceable by the application of technologies, partially through direct contact with fans, and partially through the functions of an automated play count, calculation of amounts due for exploitation of rights according to any given algorithm, to an automated handling of payments.

Finally, in the times of big data the very process of transferring cash to the appropriate account very often is not the only purpose of a transaction. The examples of digital intermediaries show how much information connected with the completion of payment may be collected and how significant they can be for the development of an artist. The information on the location of key and new audiences, their demography, customs and loyalty, with time may have a larger income-generating potential than the monetization of plays itself.

There is no reason for which access to such data could not become a service provided by CCSs to copyright owners. The fact that a system of this kind is difficult to imagine today does not mean that we should not think about designing it.

The key issue for the future of these organizations is to work on the social preconception that supporting Copyright Collection Societies is tantamount to the supporting of creative output as such. By alienating culture participants and depriving them of access to the knowledge on how royalties are distributed, they will finally put off artists who will seek constructive and positive relations with the audience ready to support them directly.

If collective management institutions do not conduct an auto-analysis on the opportunities offered to them by technology, it will be difficult for them to remain relevant to the music market and the cultural sector in general. However, if they undertake the effort to reform their procedures and adopt tech solutions, allowing them to provide more efficient, more personalized services to artists, enriched with access to the data accompanying payments, it will be beneficial both for the artists and culture.

## FOOTNOTES

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<sup>1</sup> Gowan, Michael, "Requiem for Napster". Pcworld.com, May 18, 2002  
[http://www.pcworld.idg.com.au/article/22380/requiem\\_napster/](http://www.pcworld.idg.com.au/article/22380/requiem_napster/) (access on April 17, 2015).

<sup>2</sup> Reports of CCSs for 2014 have not been made public as yet.

<sup>3</sup> So far, Polish CCSs have not informed in their reports which portion of the collections taken are the income in connection with exploitation of copyrights by electronic media. On the other hand, media such as Spotify do not make public the amount and principles of calculation of revenue streams in connection therewith to Polish CCSs.

<sup>4</sup> ZAiKS musical work application form [http://zaiks.org.pl/pliki/91/formularz\\_utwor\\_muz\\_lub\\_slowno-muz.pdf](http://zaiks.org.pl/pliki/91/formularz_utwor_muz_lub_slowno-muz.pdf) (access on April 17, 2015).

<sup>5</sup> In 2012 Amanda Palmer, an American artist who left a record label and started to independently publish her records – collected over USD 1.1 million through Kickstarter to release an album. Presently, in that manner she finances the recording and releasing of records, as well as concert tours. She described her way to the social-media based model of earning money on creative output in 2014 in the book entitled: "The Art of Asking: How I Learned to Stop Worrying and Let People Help" (Grand Central Publishing, 2014).

<sup>6</sup> PWC, *Global Entertainment and Media Outlook*, <http://www.pwc.com/gx/en/global-entertainment-media-outlook/> (access on April 17, 2015).

<sup>7</sup> Compare: "Obiegi kultury. Społeczna cyrkulacja treści." The research conducted in 2012 by Centrum Cyfrowe, which showed that the persons most intensely participating in non-formal circulation of content, i.e. inter-nauts downloading files, are the largest segment among buyers, constituting over one half of the group buying music.

<sup>8</sup> After: "iTunes by the Numbers: 800M Accounts, \$5.2B in Billings, 70B App Downloads" MacRumors, April 23, 2014, <http://www.macrumors.com/2014/04/23/apple-itunes-numbers/> (access on April 17, 2015).

<sup>9</sup> Spotify Explained, <https://www.spotifyartists.com/spotify-explained/> (access on April 17, 2015).

<sup>10</sup> Independent Digital website, <http://independentdigital.pl/o-nas/> (access on April 17, 2015).

<sup>11</sup> Spotify Explained, <https://www.spotifyartists.com/spotify-explained/> (access on April 17, 2015).

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<sup>12</sup> Peoples, Glen "The Good And the Bad of Spotify Founder Daniel Ek Streaming Defense, Billboard, November 11, 2014, <http://www.billboard.com/articles/business/6312367/good-bad-spotify-founder-daniel-ek-streaming-defense> (access on April 17, 2015).

<sup>13</sup> Alesci, Cristina, Palotta, Frank "How Much Did Taylor Swift Really Make Off Spotify", CNN Money, November 11, 2014, <http://money.cnn.com/2014/11/12/media/taylor-swift-spotify/> (access on April 17, 2015).

<sup>14</sup> Shaw, Zac "Spotify Artist Payment Transparency Challenges Corrupt Industry Status Quo", Mediapocalypse, December 5, 2013, <http://www.mediapocalypse.com/spotify-artist-payment-transparency-challenges-corrupt-industry-status-quo/> (access on April 17, 2015).

<sup>15</sup> <https://www.spotifyartists.com/> (access on April 17, 2015).

<sup>16</sup> Strycharz, Jan; Maźnica, Łukasz; Mazgal, Anna; "Polskie Organizacje Zarządzania Zbiorowego i ich dane finansowe", ("Polish Copyright Collection Societies and their Financial Data") Centrum Cyfrowe 2015, <http://centrumcyfrowe.pl/czytelnia/polskie-organizacje-zarządzania-zbiorowego-i-ich-dane-finansowe/> (access on April 23, 2015).

<sup>17</sup> Ibid.

<sup>18</sup> In the table of fees these notions have been defined as follows: *"Increased standard", "degree of attractiveness" – these are the criteria for the assessment of facilities located in the same town which in comparison with other places, meeting the basic requirements of a similar scope of activity offer services which are more attractive to consumers, at a higher level and very often applying higher prices.* The document does not specify in what manner it is determined if a given object applies higher or standard prices. In the next point of the same document the definition of "a higher price" provides that *"A higher price" – is a price specified in the offer for services or goods which in comparison to the prices of the same services and goods in the same town and at the same time, in other comparable facilities, are higher than average (e.g. prices of coffee, beer, alcohol, cosmetic treatment, hairdresser's service).*

<sup>19</sup> It is worthwhile mentioning that a businessperson or another economic unit paying the fee in many cases is legally obligated to pay the fee not only to ZAiKS, but also to other CCSs, representing, e.g. performers' rights. Thus, that requires familiarizing oneself with analogical tables created also by other collective management organizations (different from ZAiKS tables, as each CCS has a relative autonomy in the scope of determining fees).

<sup>20</sup> Judgment of the Circuit Court in Świdnica, I Civil Division of April 14, 2014, file ref. no. I C 2418/13 – the case of the Association of Authors' "ZAIKS" in Warsaw against Marcin W.

<sup>21</sup> Doctorow, Cory "Iron Maiden makes millions by touring countries where their music is most pirated", Boing Boing, December 24, 2013, <http://boingboing.net/2013/12/24/iron-maiden-makes-millions-by.html> (access on April 17, 2015).

<sup>22</sup> Filiciak, Mirosław; Hofmokl, Justyna; Tarkowski, Alek; "Obiegi kultury. Społeczna cyrkulacja treści.", Centrum Cyfrowe 2012, [http://creativecommons.pl/wp-content/uploads/2012/01/raport\\_obiegi\\_kultury.pdf](http://creativecommons.pl/wp-content/uploads/2012/01/raport_obiegi_kultury.pdf) (access on April 17, 2015).

<sup>23</sup> Sisario, Ben, "Jay Z reveals Plans for Tidal, a Streaming Music Service", New York Times, March 30, 2015 <http://www.nytimes.com/2015/03/31/business/media/jay-z-reveals-plans-for-tidal-a-streaming-music-service.html?ref=arts> (access on April 17, 2015).