

# Emergence of Hybrid Time for Media Consumption. Towards a New Research Agenda

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## ABSTRACT

**Scientific objective:** The boundaries between leisure and work time are becoming more fluid, just as barriers between media production and consumption in production of user-generated content are hard to define, yet competing with each other for customers' attention time. This article proposes a new look at the concept of hybrid time in the context of contemporary media use—flexible, multitasking, multi-threading mixed multidimensional time, which is a consequence of the digital vortex into which our life is pulled. **Research methods:** While at this time we are able to merely explore the arising issues, we suggest use of qualitative methods of analysis and a critical review of qualitative methodologies used in audience measurement when referring to traditional time budget and internet use research. **Results and conclusions:** Exploring these issues will hopefully allow us to open a new field of research communication and formulates a number of important macro-scale research hypotheses. **Cognitive value:** The article attempts to make a contribution to a new, hitherto unexplored temporal dimension of contemporary mass communication by proposing an important category of analysis of customers' attention which is hybrid time.

## KEYWORDS

hybrid time, leisure time, media consumption, prosumption, attention economy, digital economy



The modern concept of leisure time was defined and used in the industrial era in opposition to work. This was the time free “from” work, but also free from other obligations. These obligations were seen as stemming from activities necessary for biological and social existence of humans (time needed for sleep, food, health, caring for the young and the old, education, training and civic activities) (Moore, 1961). Such was the conceptualization of time in time budget studies as done periodically to this day by national statistics. The dogma of the era was to conceptualize relations between three social times as evolving and dynamic, as formulated by the theory of dynamics of social time (Dumazedier, 1974). In the 1960s and 1970s (when this theory was at its height), many economists and sociologists thought that leisure will remain the most dynamic element of social time. After the extreme exploitation of labor as seen in the 19th century, the prolongation of working week was stopped as productivity of labor increased, and trade unions grew stronger.

The distinction between work and leisure in the industrial era seemed pretty obvious: work was clearly anchored in time and space as a place people would go to, end of work also meant (physically) leaving the workplace. For the bulk of employees, fixed working hours also meant relatively inflexible leisure hours. Most of the hours needed for obligations were also relatively inflexible, as being biologically predetermined (such as the time of sleep and eating). This created an industrial temporal order which still influences us (just to mention traffic congestion at the time of commuting to/from work, peak demand for entertainment on Friday and Saturday evenings, holiday patterns strongly concentrated in time). This also provided a temporal framework for many consumption patterns, including characteristic peaks for media consumption, still to be respected by today’s highly individualized and flexible social media, even though work is becoming more remote and dissociated from the workplace. In this context leisure / work choices could also be analyzed as “*time rich/money poor*” and “*money rich/time poor*” consumer temporal strategies. The emerging digital economy is characterized by 24/7 access to institutions and services, which can satisfy their customers round the clock without committing their full resources. Given the current levels of productivity, less work time is needed to meet consumer demand (Gratton & Taylor, 2004). Our study focuses on an emerging new concept of “*hybrid time*,” in which much digital media consumption is nested, yet under contemporary lifestyles this time cannot be clearly identified as being either work, obligations or leisure time (this has characteristics of all three of them in a new mix not present in traditional media consumption forms).

Media use in the digital economy is pervasive and dominant. At this point of digital economy’s expansion not only media consumption time, but also place and context of their use seem to be underresearched by traditional methods which ascribe media consumption to a given medium (text, audio, electronic etc.). Media users use and mix various information and communication techniques both in their leisure time and at / during work. The specificity of digital economy makes media use for professional use possible both within and outside work. This means that work time is absorbed by private time and vice versa. Thus, private time becomes a yet another dimension of economic exploitation. For many types of economic activity, the development of digital and information technologies has proven to be disruptive and digital media are right at the heart of the “digital vortex,” being one of the first sectors to have fully digitized design, production, distribution and consumption of their output. The development of media and communication contribute to time and space compression, which allows media consumers to communicate in real time and be immediately informed about events worldwide.

With social communication and media use possible in places and situations that were unimaginable only a few years ago, in public places such as cafeterias, restaurants, cinemas,

while watching TV or listening to the radio, during family gatherings and in many other places / situations. Research on FOMO (Fears of Missing Out in Poland) reveals that as much as 14 percent of the respondents are highly dependent on the use of the Internet and social networks. Additionally, among all the respondents, 8% use the Internet while crossing the street, 27% while traveling by public transport, 7% in the theater or during a cinema screening, 10% during meetings with friends (phenomenon of so-called phubbing), as much as 8% use it while driving a car, 9% during flight, 6% during a business meeting and... 6% during a mass or service (Jupowicz-Ginalska, Kisilowska, Jasiewicz, Baran, & Wysocki, 2019). In all of these cases, this media use can be both for work and non-work purposes. Such a wide range of media use was possible due the expansion of miniaturized mobile devices with user-friendly software. As an attribute of modern communication, mobility allowed for media use at any time and any place convenient for their users. Coupled with the global expansion of telecoms and development of wireless communication and nearly universal access to these miniaturized and portable devices, this created the momentum for filling the chunks of time, which have so far been relatively “free” (i.e. between other activities). In a certain sense this can be seen as an extension of an older process, where insertion of the radio in a car allowed for addressing the captive audience with media content and ads.

The rare studies of this new, more intense and varied use of time point to the somewhat artificial expansion of the media consumption time, as exemplified by total summary time of media and Internet use, which when combined with time of work and obligations exceed 24 hours per day. This is technically possible due to the multiple count resulting from media users’ multitasking. However, this multitasking is heavily paid for with dropping attention spans and what social psychology describes as “overstimulation,” which further undermines the audiences’ attention, information retention rates etc. This split attention facilitates the expansion of fake news as users share content without scrutinizing sources and their credibility.

The above features of the contemporary media consumption and social communication point to a significant expansion of time for media use and its more differentiated usage patterns over the day. This is accompanied by the skyrocketing supply of content and services available on the Internet. An important part of this supply is free to the consumer, but it is paid for by advertising and other forms of marketing hoping to capture users’ attention. The basic business model in the virtual world bases on consumer profiling for the targeting of ads. This profiling is generated from observations of consumer’s behavior, his interests, reactions and online activity. One of the most important attributes of these activities is the amount of time committed to given content. Under the relative oversupply of content, attention time becomes the ultimate scarce good, for which digital economy competes. For today’s consumer the supply of time is always limited, and equal amount of time is available to all, hence the availability of this resource is thought to be more crucial than the ability to buy and own goods.

As the basis of media content monetization, time allocated to media usage is constantly monitored and analyzed. Data and information gathered indirectly (by software which tracks users’ activities) or directly from media users become part of Big Data analysis and algorithms optimizing Internet use (Kowalski, 2017; Szpunar, 2019). In this highly competitive environment, media compete for customers’ time and attention not only among themselves, but also across the whole economy. By creating attractive and optimized communication environments with their culture of communication, they are absorbing their customers’ time, which takes place at the expense of all other businesses. On the other hand, it can be noted that the development of media and communication is advantageous to other businesses, giving them access to consumer’s attention outside of his time of work, sometimes regardless of his intentions.

Research on Internet-based time spent by consumers is done both for commercial and cognitive purposes. Commercial research is done by leading social media platforms such as Facebook and Google, as well as research firms such as PBI/Gemius. They take stock of time spent online, pages/websites visited, and applications used. In their most basic form, they are freely available to Internet users, but in more elaborate form, they gather actual data on time spent at given website and online activities of each internet user and this data can be further used for consumer profiling and development of more precise algorithms. These studies often track Internet user's activity by cookies which spy on online activities. However, this research does not take into account user's intentions and especially the temporal context of activities (i.e. are they performed at work, at home, during leisure pursuits, outdoors, indoors etc).

Reputable data sources and analysts such as ActivateInc (ActivateInc, 2020), Comscore eMarketer, Titbit, Gallup, GlobalWebIndex, Interactive Advertising Bureau, Nielsen, Pew Research, ResMed, U.S. Bureau of Labour Statistics point to time allocated to "media and consumer tech activities" (enumerated as video, audio, messaging & social media, gaming and other), which altogether fills over half of US adults' daily time (12:07) and totaling to over 31 hours! There seems to be no apparent fault with the data itself, but perhaps we are facing a conceptual problem with classification of activities in daily time use of today's consumers. If so much time is indeed spent on online media (given the fixed 24 hr daily time pool), where did this time come from? It could initially be hypothesized that this comes at the expense of work time and time of obligations and that the use of leisure time itself is intensified through multitasking. Thus, it seems very likely that this intensification has its cost—that of diminishing attention so crucial at this stage of the attention economy's development. Judging by the current set of media research tools and methodologies, these questions as yet remain unanswered.

Global-sample study by GlobalWebIndex done in the 3rd and 4th quarter of 2018 and published in January 2019 show that on the average 4.6 billion Internet users were spending 6 hrs 42 minutes per day online (this data for Poland is lower—6 hrs 2 minutes). This means that annually people are spending 100 days online, equivalent to 1.2 billion years for the whole population! Again, this seems to suggest that an important part of online media consumption takes place in the ill-defined "*meantime*" (hardly a scientific concept), in the time difficult to allocate either to work, leisure or obligations. This concept is somewhat reminiscent of the economic "gray economy," but this term is not synonymous with our understanding of "hybrid time."

To put things into context the difficulty in conceptualizing and measuring "hybrid time" is amplified by the widening scope of the "prosumption phenomenon" (Toffler, 1980). The blurred line between production and consumption is highly reminiscent of hybrid time's positioning between work, leisure and obligations. The expansion of self-service activities such as self-service restaurants, filling stations, cash dispensers, check-in terminals, washing machines, vending machines or ticketing, has been around for several decades, but the switch to Internet communication has opened new areas for its expansion: accommodation and travel booking, medical diagnostics, online education and publishing, dating, even religious services (paradoxically, the COVID pandemia has made this process even more widespread and far-reaching during the lockdown period). From a purely economic perspective, this lead to further disintermediation, ruthlessly cutting out all intermediaries between the producer and the consumer. These presumptive services (such as user-generated content) are difficult to categorize within the existing conceptual framework of time use research as they are hybrid activities neither fully anchored in production nor in consumption. Yet another aspect of this mixed activity is conceptualized by some researchers as "serious leisure" or hobbies which through serious time commitments permit for amateurs to acquire professional competencies and expert status in

the field of their hobby (Stebbins, 2014). While satisfaction of amateurs reaching the pro status seems to originate from intrinsic motivation, their hobbies can be a steppingstone for their professional careers. This coincides with the monetization of special status, such as demonstrated in a spectacular way in apps such as Facebook, YouTube, Instagram or Tik-Tok.

As it appears from a preliminary screening, research projects of cognitive and scientific type in this subject area are extremely rare, but more successful in overcoming the shortcomings of purely commercial research. They attempt to assess users' motivation for the undertaken activities, as well as their temporal context (within or outside work, leisure or obliged time). They all make use of surveys in which answers are given by respondents from the available cafeteria of choices. Thus, they share the assumption that respondents can correctly self-assess their media consumption basing on a shortlist of activities (abstracting them from their temporal context). Thus watching TV at work, at home and on the move has the same status, with similar levels of consumer attention and patterns of demand. Our initial research suggests that Internet users and prosumers may have a different perception of their online activities, which makes standard questions about the amount of their time spent with the media inadequate and irrelevant to their multitasking, round-the-clock online media immersion, which is the standard of contemporary media consumption.

### **Initial Research Questions and Hypotheses**

We are trying to make our argument that “hybrid time” (however inadequately defined at this stage of our exploration of the concept) is becoming one of the key elements of modern media consumers' lifestyles. The universality of this phenomenon seems to indicate its significance not only for individuals but also (and perhaps even primarily) for the society and, consequently, for the economy as a whole. To prove our point further, it is necessary to conduct empirical research on hybrid time. An important feature of such research should be its relation to the temporal context in which media activities take place. At this stage we signal the need to verify the following hypotheses:

- Hypothesis 1. Hybrid time tentatively conceptualized as the use of various forms of online communication within temporal frameworks not intended for this purpose is now an important part of the daily media and communication activity for those who are professionally active.
- Hypothesis 2. Respondents (professionally active Internet users) are not able to correctly assess their hybrid time since too much discrepancy can be observed between their declared time use and the availability of time.
- Hypothesis 3. The scope of communication in hybrid time varies across age, sex, dwelling-place and region.
- Hypothesis 4. The use of hybrid time is greater for employers in their leisure time than the use of hybrid time by employees in their work time.
- Hypothesis 5. Hybrid time is an essential part of human time remaining for other activities and it is differentiated by variables such as age, sex, dwelling-place and region.
- Hypothesis 6. Hybrid time is an essential part of the attention economy.

While the concept of hybrid time being new and unresearched, but at this point we see the need for linking it with the new forms of work in the digital economy. Some studies address the issue indirectly (such as voicing concerns with the falling attention spans of audiences and other limitations arising from the attention economy). So far, some research has been carried out on the impact of new communication technologies on the workplace. This research pointed to disappearing or blurred traditional divisions between work time and private time. This was partly

explained by the fact that remote online work could be carried out anywhere and at anytime (De Wet & Koekemoer, 2016; Carlson, Thompson, Crawford, Boswell, & Whitten, 2018). The impact of constant online presence on the workplace and work's expansion outside of nominal place and time work was analyzed (Boswell & Olson-Buchanan, 2007; Uthpala Senarathne Tennakoon, da Silveira, & Taras, 2013; Thomas, 2014). The growing number of employees carrying out their duties both at work and at home through the extension of new communication techniques has led some researchers to rise the point of reallocation of work to home (Halford, 2005). Psychological aspects of work in work time and outside of its nominal framework were analyzed for managerial staff, together with the provision of mobile equipment for them to extend work into private life (Vayre & Vonthron, 2019). Also researched was the positive impact of new communication technologies on organization of work, communication within an organization, decision taking and flexibility of workplace and management styles (Bobillier-Chaumon, 2003; Isaac, Campoy, & Kalika, 2007), increase in the autonomy of employees (Lee & Sawyer, 2010; Tremblay, 2014). Research was also carried out on the employee overwork and fatigue caused by being overwhelmed with work outside of the workplace (Ninaus, Diehl, Terlutter, Chan, & Huang, 2015), difficulties experienced by employees trying to break away from professional duties outside their work time (Fenner & Renn, 2010), pressure and expectations from work on availability outside of working hours (Matusik, 2011). One of the aspects of hybrid time was the study on the workplace pressure on employees to be always online, leading to symptoms of Internet addiction and strange behaviour (Salanova, Llorens, & Cifre, 2011). The relation between demands of the workplace and physical health of the employees and its consequences for work motivation is at heart of Job Demand Resources model, aspiring to offer an integrated approach to relationship of the needs of employers and of the employees (Bakker & Demerouti, 2017). Polish research in this area is rare, but existent (Jung, 2011; Pańkowska, 2014) and it can provide a convenient starting point.

No study of hybrid time has been conducted so far. Studies done in Poland point to the widespread phenomenon of multiscreening. According to IAB (IAB, 2019), the percentage of effective users multiscreening (conceptualized as parallel use of TV, WWW and multiple WWW pages viewing) among internet users 15 years of age and over increased from 83% in 2014 to 93% in 2019. According to Gemius research (Gemius, 2019) the average media user allocates 2:06 hours to the Internet and 4:33 hours to TV-watching (Nielsen, 2019) with the total of these two activities being 6:25 hours per day. CBOS research (CBOS, 2018) shows that one third of Internet users is always online, while others open Web pages and apps according to their current needs.

The most detailed research is conducted as time budget studies in 10-year intervals by Statistics Poland (GUS, 2016). The last such study was done in 2013. It defines media consumption is part of a wider concept of "cultural activities" (this includes also personal hobbies related to computer use and gaming, "use of mass media" (defined as watching TV, DVD, video, listening to the radio and music). Added together these activities fill 11.6% of daily time (24 hours) or 167 minutes per day. Beside very different methodologies used in this data collection and gathering between GUS and real-time media monitoring agencies, we stress the great discrepancy between these two data sets (this discrepancy is 3:38 minutes per day, the difference being between 6:25 demonstrated by specialized research agencies and 2:47 hours of media consumption daily by the research of GUS). Without questioning credibility of both of these studies, it can safely be assumed this discrepancy may be described hybrid time of media use.

With inevitable expansion of the digital economy, the importance of hybrid time will increase and its impact on work will be (both positive and negative) multifaceted and multidimensional.

Fluid borders between work and leisure will become a universal phenomenon. Media consumption mediated by rapidly developing digital technologies is causing rapid changes in the organization and style of work, in social behavior and interaction of those professionally active and next generations. From the perspective of attention economy time has become a valuable economic resource to be mined commercially. Further development of software, digital technologies and emergence of digital services can affect future progress in time and space compression, allowing for more intense exploitation of labor in and outside of work. Measuring hybrid time seems necessary to design future regulation for labor. Research on hybrid time will eventually allow assessing economic consequences of hybrid time and show the true nature of relations between work and non-work time in the digital economy.

While at this stage of our exploratory study of issues to the emergence of hybrid time of media consumption it is difficult to draw more specific conclusions prior to doing some fundamental and (potentially) ground-breaking research on the matter, we feel the issue is so fundamental to the contemporary media industry that creating awareness of hybrid time is at this stage more important than presenting polished research results.

## Bibliography

- ActivateInc. (2020). Retrieved from <https://www.slideshare.net/ActivateInc/activate-technology-media-outlook-2020-185417815>
- AGBNielsen. (2019). Retrieved from <http://www.agbnielsen.pl/2019-11-10,2485.html>
- Bakker, A.B., & Demerouti, E. (2017). Job Demands-Resources Theory: Taking Stock and Looking Forward. *Journal of Occupational Health Psychology*, 22(3), 273–285. doi: 10.1037/ocp0000056
- Bobillier-Chaumon, M.E. (2003). Evolutions techniques et mutations du travail: emergence de nouveaux modeles d'activite. *Le Travail Humain*, 66, 163–194. doi: 10.3917/th.662.016
- Boswell, W.R., & Olson-Buchanan, J.B. (2007). The Use of Communication Technologies After Hours: the Role of Work Attitudes and Work-Life Conflict. *Journal of Management*, 33, 592–610. doi:10.1177/0149206307302552
- Business Insider (2019). Retrieved from <https://businessinsider.com.pl/media/internet/korzystanie-polakow-z-internetu-badanie-cbos/78rnxvnx>
- Carlson, D.S., Thompson, M.J., Crawford, W.S., Boswell, W.R., & Whitten, D. (2018). Your Job is Messing With Mine! The Impact of Mobile Device Use for Work During Family Time On the Spouse's Work Life. *Journal of Occupational Health Psychology*, 23, 471–482. doi: 10.1377/ocp0000103
- De Wet, W., & Koekemoer, E. (2016). The Increased Use of Information and Communication Technology (ICT) Among Employees For Work-Life Interaction. *South African Journal of Economic and Management Sciences*, 19, 1328. doi: 10.4102/sajems.v19i2.1328
- Dumazedier, J. (1974). *Sociologie empirique du loisir*. Éditions du Seuil.
- Fenner, G.H., & Renn, R.W. (2010). Technology-Assisted Supplemental Work and Work-Family Conflict: the Role Of Instrumentality Beliefs, Organizational Expectations and Time Management. *Human Relations*, 63, 63–82. doi: 10.1177/0018726709351064
- Forbes (2019). Retrieved from <https://www.forbes.pl/gospodarka/ile-czasu-polacy-spedzaja-w-sieci-danie-badanie-gemiuspbi/v9x2212>
- Główny Urząd Statystyczny. (2016). Budżet czasu ludności w 2013 roku, część II. Retrieved from <https://stat.gov.pl/obszary-tematyczne/warunki-zycia/dochody-wydatki-i-warunki-zycia-ludnosci/budzet-czasu-ludnosci-w-2013-r-czesc-ii-wraz-z-czescia-i,19,2.html>
- Gratton, Ch., & Taylor, P. (2004). Economics of Work and Leisure. In T. Haworth, & A.J. Veal (Eds.), *Work and Leisure*. London: Routledge.
- Halford, S. (2005). Hybrid Workspace: Re-Spatialization of Work, Organization and Management. *New Technology, Work and Employment*, 20, 19–33. doi: 10.1111/j.1468-005X.2005.0014.x

- IAB Polska. (2019). TV + WWW=Razem lepiej. Retrieved from [https://iab.org.pl/wp-content/uploads/2019/04/IABPolska\\_TV\\_WWW\\_RazemLepiej\\_20190405\\_raport.pdf](https://iab.org.pl/wp-content/uploads/2019/04/IABPolska_TV_WWW_RazemLepiej_20190405_raport.pdf)
- Isaac, H., Campoy, E., Kalika, M. (2007). Surcharge informationelle, urgence et TIC: l'effet temporel des technologies de l'information. *Management et Avenir*, 3(13), 149–168. doi: 10.3917/mav.013.0149
- Jung, B. (2011). W kierunku nowej ekonomii czasu wolnego? In R. Winiarski (Ed.), *Rekreacja i czas wolny*. Warsaw: Oficyna Wydawnicza Łośgraf.
- Jupowicz-Ginalska, A., Kisilowska, M., Jasiewicz, J., Baran, T., & Wysocki, A. (2019). FOMO 2019. Polacy a lęk przed odłączeniem – raport z badań. Retrieved from <https://www.wdib.uw.edu.pl/fomo>
- Kowalski, T. (2017). Między efektywnością a wolnością. Wprowadzenie do ekonomiki selekcji algorytmicznej. *Studia Medioznawcze*, 4(71), 27–39.
- Lee, H., Sawyer, S. (2010). Conceptualizing Time, Space and Computing For Work and Organizing. *Time and Society*, 19, 293–317. doi: 10.1177/0961463X10354429
- Matusik, S.F., Mickel, A.E. (2011). Embracing or Embattled by Converged Mobile Devices? User's Experience With a Contemporary Connectivity Technology. *Human Relations*, 64, 1001–1030. doi: 10.1177/0018726711405552
- Moore, W.E. (1961). *Man, Time and Society*. London: Willey and Sons.
- Ninaus, K., Diehl, S., Terlutter, R., Chan, K., & Huang, A. (2015). Benefits and Stress-Perceived Effects of ICT Use on Employee Health and Work Stress: an Explanatory Study From Austria and Hong Kong. *International Journal of Qualitative Studies on Health and Well-being*. doi:103402/qhw.v10.28838
- Pańkowska, M. (Ed.). (2014). *Frameworks of IT Prosumption for Business Development*. Hershey PA: IGI Global.
- Salanova, M., Llorens, S., & Cifre, E. (2013). The Dark Side of Technologies: Technostress Among Users of Information and Communication Technologies. *International Journal of Psychology*, 48, 422–436. doi:10.1080/00207594.2012.680460
- Southerton, D. (2006). Analysing the Temporal Organization of Daily Life. Social Constrains, Practices and their Allocation. *Sociology*, 40(3).
- Stebbins, R. (2014). *Careers In Serious Leisure. From Dabbler to Devotee in Search of Fulfillment*. Basingstoke: Palgrave Macmillan.
- Szpunar, M. (2019). *Kultura algorytmów*. Kraków: Uniwersytet Jagielloński. Retrieved from <http://www.media.uj.edu.pl/publikacje>
- Thomas, K.J. (2014). Workplace Technology and the Creation of Boundaries: the Role of VHRD in a 24/7 Work Environment. *Advances in Developing Human Resources*, 16, 281–295. doi: 10.1177/1523422314532092
- Toffler, A. (1980). *The Third Wave*. New York: Bantam Books.
- Tremblay, D.G. (2012). Work-family Balance; Is the Social Economy Sector More Supportive and If so, Is this Because Of a More Democratic Management? *Review of Social Economy*, LXX(2), 200–232.
- Uthpala Senarathne Tennakoon, K.L., da Silveira, G.J.C., & Taras, D.G. (2013). Drivers of Context-Specific ICT Use Across Work and Non Work Domains: A Boundary Theory Perspective. *Information and Organization*, 23, 107–128. doi: 10.1016/j.infoandorg.2013.03.002
- Vayre, E., Vonthron, A-M. (2019). Identyfing Work-Related Internet's Uses-at Work and Outside Usual Workplaces and Hours-and Their Relationships With Work-Home Interface, Work Engagement, and Problematic Internet Behavior. *Frontiers in Psychology*, 10. Retrieved from: <https://www.frontiersin.org/articles/10.3389/fpsyg.2019.02118/full>