# **Ludomusicology meets Japanese Game Studies**

An experience report

#### Introduction

When starting out in the field of ludomusicology, the study of games and (game) music, it does not take long before the researcher is tripping over Japanese names such as Hirokazu Tanaka (Tetris, Super Mario Land), Junko Ozawa (The Tower of Druaga, Donkey Konga), Koichi Sugiyama (Dragon Quest/Dragon Warrior series), Manami Matsumae (Mega Man, Shovel Knight), Koji Kondo (Super Mario Bros., The Legend of Zelda), Yoko Shimomura (Street Fighter II, Kingdom Hearts), Nobuo Uematsu (Final Fantasy series), and many others. As Matthew Belinkie, an early historian of game music, has put it:

Japanese composers were the first game music pioneers, and defined what sound players came to associate with games. Although composers of other nationalities have since joined the industry, nearly all of the most popular games still come from Japan, and the Japanese composers remain the most well-known and popular. Fans seem to agree that Japanese scores are still the best. (Belinkie 1999)

Much has changed since this statement, both in the worlds of game and game music production as well as research. Today, renowned game music composers can be found all over the world.<sup>1</sup> Moreover, game music reaches a much broader international audience than it did in the late 1990s. Separate from the games themselves, its distribution happens via multifarious channels, for example through (orchestral) live performances (see e.g. Böcker 2021), album releases, specialized podcasts, radio stations, or fan cultural practices, such as

<sup>1</sup> Furthermore, Belinkie's observation is based on a specific perspective that is rooted in his own cultural background and mostly describes the situation in the US at that time. This matter will be taken up later in this report.

the production of cover versions. Nevertheless, the special status of Japanese game music and its composers remains discernable: A look at the annual Game Music Awards, for example, reveals that the category "Artist of the Year" is explicitly split between "Japanese Composer" and "Western Composer" (see Kotowski 2021).

From very early on, the academic study of digital games, as conducted within the frame of societies such as DiGRA (Digital Games Research Association) or published in dedicated journals such as *Game Studies: The International Journal of Computer Game Research*, has included internationally successful Japanese games such as *Space Invaders* (see e.g. Juul 2001). Subsequently, the study of Japanese games, game culture, education, and industry has grown as a specific subfield within game studies and is e.g. prominently represented by the annual "Replaying Japan" conferences or the Japanese DiGRA chapter.

During the last decade, the specialized subfield of ludomusicology has also emerged. Unfortunately, contact between the two fields has been limited to date. This can primarily be explained by two factors: Firstly, while a broader investigation of game music by Japanese composers is and has been at the core of the ludomusicological discourse from the outset, with papers being presented at ludomusicology conferences and the first books on game soundtracks being published, an investigation of, for example, composer biographies, of the type conducted in other fields of musicological research, remains rudimentary. Secondly, there is a notable dearth of studies that take into account the broader cultural context, both in terms of game music's impact in Japan and culturally influenced contexts such as processes of production.

This personal experience report is a reflection on this situation from my perspective as a ludomusicologist. I begin with a brief overview of the ludomusicology field, as I assume (and hope) most readers of this report are based in other subfields of game studies or even other disciplines. This is followed by an outline of the current state of research with regard to the above-mentioned topics within ludomusicology. And in a last step, I sketch some of my own experiences regarding the obstacles that I have encountered during my ludomusicological forays into the world of Japanese game music, its composers, and history so far. My aim is to call fellow game researchers from other fields to action, in the hope that their expertise and perspectives will collaboratively fill in the many blanks that remain in the ludomusicology discourse until the time of writing.

### What is Ludomusicology?

While the term ludomusicology emerged from nascent and mostly musicological investigations into game sound and music (see Fritsch and Summers 2021a, 1–4), it is nowadays considered as a subfield of game studies. Some early scholarly publications from the 1980s can be found alongside handbooks and articles for programming and designing game music. But it took until the late 2000s for the field to gain traction and for the publication of an increasing number of papers, talks, and articles examining the manifold interrelationships and practical questions of games, music, and sound (for a bibliographical overview, see Kamp 2016). Beyond musicology, scholars mostly from fields such as psychology, computer science, or education have made contributions, but we are delighted to see colleagues from other disciplinary backgrounds start to develop an interest in the topic as well.

In 2011, the first academic group was founded, in the form of the Ludomusicology Research Group. This group became the driving force behind the annual European Conferences of Video Game Music and Sound, which have been held since 2012. It did not take long for other groups to pop up, including the North American Conference of Video Game Music (founded 2014, see Park 2021), the Ludomusicological Society of Australia (founded 2017, see Smith 2020), and the LUDUM group in Chile (founded 2018, see Grez 2019).<sup>2</sup> In 2016, some of these local groups founded the Society for the Study of Sound and Music in Games (SSSMG) as an umbrella organization and established a subject-specific journal, the *Journal of Sound and Music in Games* (published in collaboration with the University of California Press since 2020).

Looking at this development of the field it is unsurprising that the ludomusicological discourse is currently dominated by publications written by researchers (oftentimes with a background in musicology) from the Anglo-American and European communities (see Park 2020).<sup>3</sup> Indeed, this is already sparking critical discussions within the field. One aspect of such conversations concerns the name of the field: Some researchers prefer the term "game music studies" over "ludomusicology" as they feel that the word "musicology" does

<sup>2</sup> There are also ludomusicologists in other countries, including France (see Rebillard and Morisset 2019), Spain, or in German-speaking countries (such as myself), who publish in other languages as well. However, local organizational structures similar to those mentioned in the main text have yet to be founded at the time of writing.

<sup>3</sup> Regarding the topic discussed in this report, it is worth mentioning that despite having such a rich game music history and culture, as well as there being many big-name composers from Japan, there is currently no Japanese ludomusicology group that I know of.

not properly reflect the broad, interdisciplinary spectrum and potential perspectives from which the subject could and should be addressed.

Personally, I prefer the term ludomusicology as it includes all three core areas of current ludomusicological investigation: Firstly, the study of music as a design element in games and music games as a specific genre (with respect to topics such as the history, design strategies, or compositional practices) as well as the development of subject-specific approaches and methodologies for study. As indicated above, this was also the starting point from which ludomusicology fanned out into the other two areas and started to be investigated as a broader phenomenon. Secondly, ludomusicology is interested in the study of cultural and fan cultural practices that have evolved around the games and their music, cultural interrelations with other media forms and musical genres, and the use of games and music games in educational contexts. And thirdly, ludomusicology reflects on the ways in which games and music can be studied as playful practices in and of themselves. This last-mentioned perspective has the potential to open up interesting new directions and approaches, including, for example, the study of musics that are not Western Art music, forms of improvised musics, or music that is procedurally generated live by a computer system. I would argue, therefore, that the term game music studies would unnecessarily limit the field to a specific research object. That said, having originally trained in another field myself (namely, Performance Studies),4 I acknowledge that the indirect claim to musicology and its specific set of methods (as useful as these are) implied by the term ludomusicology is problematic.<sup>5</sup>

<sup>4</sup> For example, in my 2018 book, I have developed a theoretical framework that is rooted in performance theory to investigate all the above-mentioned ludomusicological areas and broaden the scope from an investigation of the music itself using traditional musicological approaches to games and their music as cultural phenomena (an English-language summary of the framework can be found in Fritsch and Summers 2021, 238–261).

<sup>5</sup> On an even more anecdotal note: When speaking to colleagues from other fields about the desiderata described in this report, I frequently get the response that there is indeed an interest in these topics, but it is immediately followed by remarks such as, "but I am not a musicologist" or "but I have no idea about music" to explain why they have not been working on them. It could be worthwhile reflecting on the potential invisible barriers that the field of musicology and, subsequently, ludomusicology may have built or inherited from their own history, which make researchers from other fields shy away from engaging with music as the subject of research (see also Park 2020).

#### State of research

The music for games and game series produced by Japanese companies not only had a major influence on the development of game music itself, its topoi, aesthetics, and implementation, but also on music history in general, as composer interviews and journalistic investigations and recent research indicates. As, for example, music producer Just Blaze put it in Nick Dwyer's *Diggin' in the Carts* (2014) video documentary: "You have these guys, literally on the other side of the world, directly influencing an entire generation of American kids and music nerds[.]" Musicians and groups such as Jesse Saunders ("On & On", 1984), Buckner & Garcia ("Pac-Man Fever", 1981), Ambassadors of Funk ("Super Mario Land", 1992), amongst many others, have incorporated game music by Japanese composers either in their work or at least referred to it, for example by sampling or borrowing melodies, sounds, or the 8-bit sound aesthetic of early game music. Hence, this music found its way into wider pop culture very early on (see Fritsch 2018, 2020; Fritsch and Summers 2021b, 389–394).

As outlined in the previous sections, these scores, as well as their implementation in the games, have been the subject of ludomusicological investigations since the very beginning, in the form of articles and single book chapters. However, while the first dedicated ludomusicological studies of a specific game or game series are being published (e.g. Schartmann 2015 on Super Mario Bros.; Summers 2021 on The Legend of Zelda: Ocarina of Time), extensive monographs or anthologies on the works of a specific Japanese composer as well as biographical and historiographical studies dealing with, for example, local game music cultures, of the kind common to other areas of music research, are yet to be published. In that regard, the current predominance in ludomusicological research of papers and articles investigating the work of male composers such as Koji Kondo, Nobuo Uematsu, Motoi Sakuraba, or Koichi Sugiyama, is striking. It is only since the mid-to-late 2010s that scholarly work has started to recognize the tremendous influence female composers and sound designers had on game music, especially in the 1980s Japanese games industry (see e.g. Rietveld and Lemon 2018, 2021; Cook 2020; Ozawa 2021; Fritsch 2021). Major contributions in that area have been made by Karen Collins and Chris Greening (2016) with their documentary and interview collection Beep, as well as Nick Dwyer's aforementioned documentary and interview series. Both projects have collected highly valuable biographical and historical first-hand information and testimonies from Japanese game music composers of all genders, but they also shed initial light on the contributions women composers have made to the genre.

Additionally, general questions on the influence of musics other than Western Art Music and, specifically, the use of traditional Japanese tonalities in games have been the subject of more recent conference papers and articles on, for example, the use of Gagaku and Zokugaku, as discussed in Liam Hynes-Tawa's paper "Traditional Japanese Modes in Video Game Soundtracks" (2020). Furthermore, the practice of localization and the implications regarding game music attracts interest (see e.g. Gibbons 2021). As, for example, Tim Summers (2016, p. 26) has demonstrated, some game soundtracks differ remarkably from the original to a localized version. A similar issue can be found regarding game versions that have been ported from one platform to another. These branches of ludomusicological research are also yet to be expanded.

Besides the music *in* games, music games produced by Japanese companies have also been investigated (e.g. Kaneda 2014; Shultz 2016). In particular, the first boom of music games in Japan, in the mid-to-late 1990s, which saw the release of titles such as *Beatmania* or *PaRappa The Rapper*, illustrates the need to include aspects of cultural background (e.g. regarding specific markets and their audiences, interrelationships with other local markets, such as the music market) and the history and specificities of the Japanese game industry in any reflection (e.g. in the form of specific, culturally influenced approaches towards the implementation of work flows, corporate culture, or crediting).

The study of these contexts and how they might influence games and their music, as well as the perception of game music in broader culture, has started to attract attention itself, albeit only recently. This is rather astonishing given that game music was already a cultural phenomenon in its own right in Japan during the 1980s, with recording releases since 1984, orchestral concerts since 1987, coverage in fan magazines, and even entire game music festivals since 1990.6 Nevertheless, a look at the body of research documented in the

<sup>6</sup> The first game music album that we know of was simply entitled "Video Game Music" and was published by Yen Records, a sublabel of Alfa Records, in 1984. It featured original music for Namco games, such as "Xevious", "Phozon", or "Pac-Man". The producer was Haroumi Hosono, a member of the world-famous computer music group Yellow Magic Orchestra. The success of the album sparked two more releases in 1984 and 1985, namely, "Super Xevious" and "The Return of Video Game Music", also produced by Hosono (see Ozawa 2021). These albums were followed by a series of further releases with music from all major game manufacturers and publishers (such as Namco, Nintendo, Nihon Falcom, and many others) and arranged into musical styles from orchestral to rock (see Kohler 2004, 134). Game companies further expanded into the live music market with the so-called Sound Teams, flanked by composer interviews and special issues dedicated to music in major game journals, including Beep, Gamest, or company-owned fan magazines such as NG, the Namco Community Magazine (1983– 1993). Additionally, the first-ever orchestral live music performance of game music had also taken place in Japan on August 20th 1987, namely, the Dragon Quest concert conducted by the composer, Koichi Sugiyama, at Tokyo's Suntory Hall. For more details

SSSMG bibliography reveals only a few articles and book chapters that have this topic as their focus. Of course, there were some early approaches, most prominently but not exclusively Belinkie's above-quoted article, or Chris Kohler's "Power-Up: How Japanese Video Games Gave the World an Extra Life" (2004). Yôhei Yamakami's and Mathieu Barbosa's article on the geemu ongaku culture (2015) explicitly dealt with the theme of game music beyond the games themselves in Japan. At the time of writing, however, this corpus remains limited

# My ludomusicological journey to Japan... and where I hit brick walls

My ludomusicological journey started when I first held an NES controller in my hands in the mid-1980s.<sup>7</sup> As per the story recounted repeatedly in earlier game history writing, the company had taken advantage of the US game industry crash of 1983 by applying a cleverly orchestrated marketing strategy when introducing their NES console in 1985 (see e.g. Ryan 2012, 64–65; Schartman, 2015, 13–15). It is nevertheless worthwhile mentioning that this history of Nintendo in "the Western hemisphere" is actually a history of Nintendo in the US. One of the consequences of this particular view has been pointed out by John Szczepaniak et al.:

Japan has long been viewed by the West as a console-centric country, ever since Nintendo and the NES. But there is another, mostly forgotten world of Japanese gaming history, in which thousands of games were developed for various Japanese computers over an 18-year period that stretches from the late 1970s to the mid-1990s. For all that Nintendo started, it was the open hardware of NEC and other companies that allowed small groups to form and become giants. [...] The early Japanese computing scene was an intense flurry of creativity that launched the careers of many prominent figures in

on these topics, see e.g. Kohler 2004; Yamakami and Barbosa 2015; Ozawa 2021; Fritsch 2021.

<sup>7</sup> Like many other kids of my generation in the US and Western Europe, I was raised on the game music of Nintendo machines such as the NES, the Super NES, or the Game Boy. It needs to be underlined that this reflects my own personal experience. Recent investigations into the histories of local game markets and cultures in Europe, however, have indicated that gaming culture was much more multifaceted than only such personal experiences may indicate or even early writing on game history suggests. Besides consoles, home computers such as the C64, the Amiga series, or the ZX Spectrum were major gaming platforms. Future investigations will certainly help to diversify the picture even more. For the UK as one example, see Kirkpatrick 2015.

the video game industry, while also establishing some of the most famous video game companies, such as Square, Enix, Falcom, and Koei. (Szczepaniak et al. 2009)

Thankfully, this situation is starting to change, also thanks to increasing studies looking explicitly at the history of games and game development in Japan, as outlined above (see e.g. Fuji 2006). Nevertheless, both the actual dominance of Nintendo machines, especially in the US market, as well as this game historical narrative, have inevitably impacted early ludomusicological investigations in general. Nintendo games, such as the Mario, Zelda, or Final Fantasy series, have long dominated research in ludomusicological studies, for example. This canon-building and all its implications are currently the subject of critical debate within the ludomusicological discourse.<sup>8</sup>

Subsequently, when I started working in the field of game music in early 2009, these circumstances as well as my aforementioned personal experience also formatted my perspective. While writing my PhD thesis, which included case studies on the work of Japanese composers Koji Kondo and Nobuo Uematsu, as well as music game designer Tetsuya Mizuguchi, I drew on the existing body of literature at the time (predominantly written in English and from an Anglo-American or European perspective) and materials such as interviews that were available in a language I was proficient in. I assumed that research on game music in Japanese was certainly out there, but as I do not speak the language this research was beyond my reach.

Having read Yamakami and Barbosa's aforementioned article (2015), my ludomusicological path led me, in late 2015 and early 2016, more directly towards the history of Japanese game music fan culture. While Belinkie and Kohler had already mentioned the specific development of game music culture in Japan with live concerts, album releases, features in fan magazines, or even Game Music Festivals, this was a rare treatment of the topic in an article dedicated exclusively to the issue, and, moreover, one that was not written from an external perspective. I gave a talk at the "Replaying Japan" conference in 2016 in which I pointed out the traces that Japanese game music has left in other music genres and media forms, in the hope of teasing out additional hints from fellow ludomusicologists in Japan and/or the Japanese game studies community working on these music-related topics. I was, therefore, astonished to learn from colleagues that neither group existed, at least as far as they were aware. In 2017, I participated in the 2nd International Workshop "Japanese

<sup>8</sup> The winter issue of the *Journal of Sound and Music in Games*, for example, presents several articles discussing this matter under the theme "Colloquy: Canons of Game Music and Sound". See <a href="https://online.ucpress.edu/jsmg/issue/1/1">https://online.ucpress.edu/jsmg/issue/1/1</a> (accessed 15 June 2021).

Videogames Between the Local and the Global", at Leipzig University, where I presented a "Project draft. Japanese game music culture in the 1980s and its connections to local and global popular music". Again, I was hoping to glean information or hints on or from a Japanese-language discourse on such topics that I was unable to access due to my lack of language skills. But again, colleagues corroborated the impression that no research in the Japanese language or in Japanese game studies discourses beyond ludomusicology were available.9

In summer 2019, I was dumbstruck for the third time by this apparently ongoing situation, when I planned to work on a chapter on female Japanese composers, who were pioneering in the Japanese industry in the 1980s and doing groundbreaking work that would strongly influence the history of game music (see Fritsch 2021). Again, when looking into the existing body of ludomusicological literature and asking colleagues in both the ludomusicology and Japanese game studies communities, only one paper came to light (Rietveld and Lemon 2018), plus the interviews conducted by Dwyer as well as Collins and Greening. So, instead of conducting the originally planned case studies on female composers from this era, the chapter became rather a compilation of possible reasons for this situation and a pointer towards the manifold blank spaces that are encountered when trying to write about such topics.<sup>10</sup>

The most obvious problem for many ludomusicologists, such as myself, wanting to work on these topics, is the lack of Japanese language proficiency. 

What Szczepaniak et al. have described for Japanese PC games produced for platforms popular in Japan during the formative 8-bit era also holds true in general for Japanese games exclusively produced for the Japanese market:

<sup>9</sup> Except for a chiptunes book by Haruhisa "hally" Tanaka (2017), I am still not aware of any, but that does not mean that there is nothing out there.

<sup>10</sup> Working on that chapter also became the initial spark for writing this experience report as a means to reach out to other communities proficient in the areas that we ourselves apparently cannot yet cover. Furthermore, as Tim Summers and I were working on the "Cambridge Companion to Video Game Music" at that time, this desideratum sparked the idea of reaching out to Lemon and Rietveld and asking them to convert their 2018 talk into a book chapter, and Junko Ozawa, who kindly gave us insights into her work and composer biography for the book (see Lemon and Rietveld 2021; Ozawa 2021). Without the outstanding help and translations (Japanese-English) of Lyman Gamberton, though, we would have not been able to contact her and conduct the interview.

<sup>11</sup> Fortunately, colleagues such as Brooke McCorkle, who have these skills, are starting to enter our field, and I am very much looking forward to seeing their future contributions.

<sup>12 &</sup>quot;Three companies eventually shared the 8-bit crown: NEC, with its PC-8800 series; Fujitsu, with the popular FM-7; and Sharp, with the X1. NEC would later come to dominate the Japanese computing scene for over 10 years with another computer, the

Unfortunately, this important part of gaming history has been largely obscured by time and language barriers. If you want to play these games you have to work at it, since they're not easy to find, and rarely described in languages other than Japanese. [...] Even downloading complete file archives, which are always missing titles due to a lack of definitive listings, will often present you with folders in Japanese characters (assuming your computer can even display them). (Szczepaniak et al. 2009)

Beyond in-game texts, Japanese language skills are mandatory in order to read the game menus, to follow instructions, game credits, access additional material such as interviews or articles, or just successfully play the original versions of usually text-heavy game titles from genres such as RPGs or adventures. The problem of language skills could, of course, be resolved by learning Japanese, but this is certainly not a trivial task, and, I assume, a rather time-consuming one, especially for those striving to achieve a level of fluency that unlocks innuendos and other linguistic nuances.

In that regard, a proficiency in the manifold cultural areas influencing games and their music, such as Japanese history, mythology, pop culture, and traditional as well as Japanese pop music, is also helpful, in order to, for example, identify references to or the inclusion of traditional Japanese music or pop music, or to spot compositional allusions to narrative motifs. Collaborative play with colleagues proficient in these areas and the language, who can not only add a mere translation of in-game text or credits, but also identify specific cultural concepts expressed that potentially also relate to the music, could yield some fascinating results.

While, at first glance, the problem of displaying Japanese characters, as described by Szczepaniak et al., is not that much of an issue on standardized console systems, the (frequent non-)availability of the original versions of these systems outside Japan and games produced only for the Japanese market for hands-on research can be a major hindrance. The costs of acquiring the original systems needed to play such games can be high. In some cases (particularly with respect to arcade machines) travelling to Japan can be the only option. As ludomusicology is a nascent field, many researchers are still in an early phase of their career and therefore lack the funding to invest in a collection of original Japanese gaming systems and games or to travel abroad. It is only in recent years that the first ludomusicologists have been appointed to academic positions that allow them to apply for such funding and game archives and

<sup>16-</sup>bit PC-9801, but Fujitsu and Sharp were able to maintain a small but loyal following by staying competitive and eventually releasing two incredible 16-bit machines of their own: the Fujitsu FM Towns, and the Sharp X68000." (Szczepaniak et al. 2009)

collections such as the Japanese games collection in Leipzig have appeared on the map and were made accessible.<sup>13</sup> Subsequently, many of us (including myself) work with the material we can get our hands on and which is available in a language we are proficient in.

The practice of localizing both games and technology<sup>14</sup> can assist our work, but it can also be problematic, for example when major differences are found between the original and the localized version. This can concern a game's music itself, as already mentioned, or when technology has been localized, as in the case of the Famicom and the NES, which use other sound chips or sound chip versions, which can alter the aesthetic experience of sound and music, in some cases quite profoundly.

Further obstacles relate to local and historical practices of game production, as indicated above. For example, when I tried to track a composer's work, particularly during the formative decades of the 1980s and 1990s, the practice of summarizing composers and sound designers under group monikers, crediting them under different pseudonyms, or not crediting them at all, is a major issue. In addition, localized as well as versions ported to other systems often credit the arranger, whereas the name of the original composer does not appear, as Rietveld and Lemon (2018 and 2021) have found. Again, the investigation of first-hand material such as game credits, Japanese gaming magazines, liner notes in album releases, as well as composer interviews, could help decisively to add to the picture, as the first approaches by Collins and Greening and Dwyer have demonstrated. Furthermore, a dive into company archives (which apparently exist, as Nihon Falcom or Namco reveal on their respective webpages) could unearth information yet unknown. It is questionable, though, whether companies would permit such investigations due to considerations of proprietary data, and, indeed, composer interviews can be restricted by NDAs.

A final issue concerns cultural contexts. While current scholarly investigations of game music are frequently concerned with the games and their musics (the works themselves so-to-speak) aspects of the cultural context, such as the situation in the game industry in Japan, corporate culture, as well as doujin games and fan culture, touchpoints between game music and other dominant trends on the Japanese music market at the time, among other topics, are also yet to be more thoroughly investigated and added to the landscape. <sup>15</sup>

<sup>13</sup> See https://home.uni-leipzig.de/jgames/en/jgames-lab/ (accessed 15 June 2021).

<sup>14</sup> The NES, as released in the US in 1985 and a year later on the European market, for example, was a redesigned version of the Famicom released in 1983.

<sup>15</sup> Lasse Lehtonen's recent talk on Koichi Sugyjama's role in establishing orchestral game music live concerts in Japan, for example, has demonstrated how composer biog-

Of course, this list is not exhaustive and written from my personal experience. Nevertheless, I hope it helps to outline the problems ludomusicologists currently encounter and the gaps in the discourse that colleagues from other cultural and disciplinary backgrounds could fill with their much-needed perspectives and expertise.

#### **Conclusion:** An invitation

Repeatedly confronted with the above-mentioned issues since I started working in the field of ludomusicology, I have come to the conclusion that a more intensive exchange between the ludomusicology and Japanese game studies communities as well as Japanese colleagues with a background either in game studies or other fields regarding such topics is long overdue. While this is one of the wonderful aspects of games and also their study, i.e. that they invite investigations from so many perspectives and multifarious angles, this also bears the risk that specific interest groups tend to be detached from each other, thus missing out on opportunities to exchange perspectives and spark necessary debates.

My aim in writing this personal research report has been, therefore, to encourage further collaboration and exchanges within the several subfields of same studies, and to invite scholars from other fields to include Japanese game music, game music culture, and the interrelationships with broader culture into their studies. Similar to the study of games themselves, the study of game music in all its facets and manifestations, as well as its connections to the cultural contexts in which it was produced and received, offers an opportunity to include diverse voices and perspectives and will help to complete the picture of this important part of game music history and culture.

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raphies can help to further contextualize not just their work for games themselves, but also the cultural impact it has. Therefore, he highlighted the need for Japanese game music history to be contextualized "in the broader trajectory of modern Japanese music", as he stated in the talk's abstract. See <a href="https://www.ludomusicology.org/calendar/ludo2021-programme/">https://www.ludomusicology.org/calendar/ludo2021-programme/</a> (accessed 15 June 2021).

#### References

- Belinkie, Matthew. 1999. "Video Game Music: Not Just Kid Stuff."
  - Accessed 20 December 2020. http://www.vgmusic.com/information/vgpaper.html
- Böcker, Thomas. 2021. "Producing Game Music Concerts." In *The Cambridge Companion to Video Game Music*. ed. by Melanie Fritsch and Tim Summers, Cambridge: Cambridge University Press, 424–432.
- Collins, Karen, and Chris Greening. 2016. The Beep Book. Documenting the History of Game Sound, Volume 1 and 2. Waterloo: Ehtonal. Inc.
- Cook, Karen. 2020. "Jun Chikuma's Soundtrack for Faxanadu (1987)." Talk given at the North American Conference of Video Game Music 2020. Unpublished.
- Dwyer, Nick. 2014. *Diggin' in the Carts*. Video documentary series.

  Accessed 8 January 2021. http://daily.redbullmusicacademy.com/2014/10/diggin-in-the-carts-series
- Fritsch, Melanie. 2018. Performing Bytes. Musikperformances der Computerspielkultur. Würzburg: Königshausen und Neumann.
- Fritsch, Melanie. 2020. "(Re)Sounding The World. Wie Popmusik und Videospiele sich gegenseitig inspirieren," *GAIN. Magazin für Spielekultur*, 15, 12–17.
- Fritsch, Melanie. 2021. "Heroines Unsung: Female Japanese Game Music Composers." In Women's Music for the Screen: Diverse Narratives in Sound, ed. by Felicity Wilcox, New York: Routledge (in press).
- Fritsch, Melanie. 2021. "Game Music Performance. Introducing a Ludomusicological Theory and Framework." In *The Cambridge Companion to Video Game Music.* ed. by Melanie Fritsch and Tim Summers, Cambridge: Cambridge University Press, 238–262.
- Fritsch, Melanie, and Tim Summers (eds.) 2021. *The Cambridge Companion to Video Game Music.* Cambridge: Cambridge University Press.
- Fritsch, Melanie, and Tim Summers. 2021a. "Introduction." In *The Cambridge Companion to Video Game Music*. ed. by Melanie Fritsch and Tim Summers, Cambridge: Cambridge University Press, 1–4.
- Fritsch, Melanie, and Tim Summers. 2021b. "Beyond the Game. Introduction." In *The Cambridge Companion to Video Game Music.* ed. by Melanie Fritsch and Tim Summers, Cambridge: Cambridge University Press, 389–394.
- Fujii, Daiji. 2006. "Entrepreneurial Choices of Strategic Options in Japan's RPG Development." In International Research Workshop on R&D, Patents and Technological Progress in North-East Asia, Okayama.
- Gibbons, William. 2021. "Open Worlds: Globalization, Localization and Video Game Music." In *The Cambridge Companion to Video Game Music.* ed. by Melanie Fritsch and Tim Summers, Cambridge: Cambridge University Press, 359–375.
- Grez, Ariel. "Video Game Music Research in Chile." Blog entry, Ludomusicology Research Group. Posted 30 August 2019. Accessed 8 January 2021. https://www.ludomusicology.org/2019/08/30/video-game-music-research-in-chile/
- Hynes-Tawa, Liam. 2020. "Traditional Japanese Modes in Video Game Soundtracks." Talk given at the North American Conference of Video Game Music 2020. Available online. Accessed 14 June 2021. https://www.youtube.com/watch?v=4UCSeuiRtUg
- Juul, Jesper. 2001. "Games Telling stories? A Brief Note on Games and Narratives," Game Studies: The International Journal of Computer Game Research,1 (1), July 2001. Accessed 14 June 2021. http://www.gamestudies.org/0101/juul-gts/

- Kamp, Michiel. *Bibliography Reflections*. Blog entry, Society for the Study of Sound and Music in Games. Posted 19 December 2016. Accessed 5 January 2021. https://www.sssmg.org/wp/2016/12/19/bibliography-reflections/
- Kaneda, Miki. 2014. "Rhythm Heaven: Video Games, Idols, and Other Experiences of Play." In *The Oxford Handbook of Mobile Music Studies, Vol. 2.* ed. by Sumanth Gopinath and Jason Stanyek, New York: Oxford University Press, 427–449.
- Kirkpatrick, Graeme. 2015. The Formation of Gaming Culture: UK Gaming Magazines, 1981–1995. Basingstoke /New York: Palgrave Macmillan.
- Kohler, Chris. 2004. *Power-Up: How Japanese Video Games Gave the World an Extra Life.* Indianapolis, IN: BradyGames.
- Kotowski, Don. "Annual Game Music Awards 2020 Nominations," VGMO: Video Game Music Online. Posted on January 12, 2021. Last modified on January 19, 2021. Accessed 14 September 2021. http://www.vgmonline.net/awards2020nominations/
- Lehtonen, Lasse. 2021. "Kōichi Sugiyama, Japanese Music History, and the Origins of Game Music Concerts." Talk given at Ludo2021: Tenth European Conference on Video Game Music and Sound 2021. Unpublished.
- Ozawa, Junko. 2021. "Waveform Wizard. An Interview with Composer Junko Ozawa" (transl. by Lyman Gamberton). In *The Cambridge Companion to Video Game Music.* ed. by Melanie Fritsch and Tim Summers, Cambridge: Cambridge University Press, 52–58.
- Park, Hyeonjin. 2020. "The Difficult, Uncomfortable, and Imperative Conversations Needed in Game Music and Sound Studies," *Journal of Sound and Music in Games* 1 (1): 87–94. https://doi.org/10.1525/jsmg.2020.1.1.87
- Park, Hyeonjin. "Across the Big Pond: North America's Expansion of Ludomusicology". Blog entry, Ludomusicology Research Group. Posted 4 January 2021. Accessed 8 January 2021. https://www.ludomusicology.org/2021/01/04/across-the-big-pond-north-americas-expansion-of-ludomusicology/
- Rebillard, Fanny and Antoine Morisset. "French Ludomusicology Today: Something that was born some time ago, but we are not quite sure of what is it yet." Blog entry, Ludomusicology Research Group. Posted 9 May 2019.

  Accessed 8 January 2021. https://www.ludomusicology.org/2019

  /05/09/french-ludomusicology-today-something-that-was-born-some-time-ago-but-we-are-not-quite-sure-of-what-is-it-yet/
- Rietveld, Hillegonda and Andrew Lemon. 2018. "The Streetfighter Lady: Invisibility and Gender Role Play in Game Composition." In *DiGRA ITALIA 2018: Women, LGBTQI & Allies: Videogiochi e identità di genere*, ed. by Marco B. Carbone, and I. Mariani, Palermo: DiGRA Italia. Accessed 5 January 2021. https://openresearch.lsbu.ac.uk/item/869x6
- Rietveld, Hillegonda and Andrew Lemon. 2021. "Female Credit: Excavating Recognition for the Capcom Sound Team." In *The Cambridge Companion to Video Game Music.* ed. by Melanie Fritsch and Tim Summers, Cambridge: Cambridge University Press, 376–388.
- Ryan, Jeffrey. 2012. Super Mario. How Nintendo Conquered America. New York/London: Penguin.
- Schartmann, Andrew. 2015. Koji Kondo's Super Mario Bros. Soundtrack. New York: Bloomsbury.

Shultz, Peter. 2016. "Rhythm Sense: Modality and Enactive Perception in Rhythm Heaven." In *Music Video Games. Performance, Politics, and Play.* ed. by Michael Austin, New York: Bloomsbury, 251–274.

Smith, Barnabas. "To Love and Learn Game Music in the South".

Blog entry, Ludomusicology Research Group. Posted 17 May 2020.

Accessed 8 January 2021. https://www.ludomusicology.org/2020/05/17/to-love-and-learn-game-music-in-the-south/

Summers, Tim. 2016. *Understanding Video Game Music*. Cambridge University Press.

Summers, Tim. 2021. The Legend of Zelda: Ocarina of Time. A Game Music Companion.
Bristol: Intellect.

Szczepaniak, John et al. Retro Japanese Computers: Gaming's

Final Frontier. Blog entry, Hardcore Gaming 101.

Accessed 5 January 2021 https://web.archive.org/web/20170716214529/http://www.hardcoregaming101.net/JPNcomputers/Japanesecomputers.htm (only available via Wayback Machine Internet archive)

Tanaka, Haruhisa "hally". 2017. All About Chiptune. Tokyo: Seibundo-shinkosha.

Yamakami, Yôhei and Mathieu Barbosa. 2015. "Formation et développement des cultures autour de la «Geemu ongaku» (1980–1990)," *Kinephanos. Revue d'études des médias et de culture populaire* 5 (1) (December 2015), 142–160. http://www.kinephanos.ca/2015/geemu-ongaku/

#### **Online Sources**

DiGRA (Digital Games Research Association): www.digra.org

DiGRA Japan: https://digrajapan.org

[j]Games Lab (Leipzig University): https://home.uni-leipzig.de/jgames/en/jgames-lab/

Journal of Sound and Music in Games: https://online.ucpress.edu/jsmg/Ludomusicology Research Group: http://www.ludomusicology.org

Ludomusicological Society of Australia: http://ludomusicologysociety.com.au

Replaying Japan: https://replaying.jp

Society for the Study of Sound and Music in Games: https://www.sssmg.org

# Comment by Taeko Edaki

This chapter is a good guide for newcomers to Ludomusicology. It also describes the author's own experience. Indeed, in my opinion, it will become the primary source for learning about the birth of Ludomusicology. In Japan, this study will encourage the conservation of materials and data that can also be shared with foreign researchers. Currently, many digital materials, not just games, are poorly preserved. Storing digital materials – games or otherwise – for a long period of time is problematic. This study opens the way for a discussion of conservation methods and Ludomusicology.

## Comment by Cäcilia Sauer

Melanie Fritsch's experience report perfectly summarizes the difficulties confronting researchers in the field of Ludomusicology. Reporting about her own experience when researching video game music, she also gives a short overview of the relatively young research field, which has only been established in recent years.

While reading, I was constantly reminded of my own research problems. Just like Fritsch describes it, it is very challenging to find reliable source material given the limited amount of academic work that has been done to date in general – let alone more detailed work on Japanese game music. Japan has made a huge impact on video game music, yet most of the publications in the area of Ludomusicology are Western-centered and language barriers make it difficult for non-Japanese speakers like Fritsch and myself to analyse Japanese content.

Hopefully, Fritsch's chapter will inspire Japanese-speaking academics to become interested in video game music. There is much research to be done and globally exchanging our ideas will certainly make things easier. In the meantime, I probably have to work on my Japanese language skills.