DIGITAL GAMING'S SOUTH-SOUTH CONNECTION

THOMAS APPERLEY

Digital games are a site of intercultural contact, and while this intercultural contact isn't necessarily welcomed by some players, others are willing to undertake considerable constraints on their activities just have the chance to play with another person in an overseas location.[1] Other intercultural elements of the digital games industry and aesthetic of digital games have been noted in previous scholarship by Mia Consalvo, which pinpoints their hybrid origin,[2] produced through the cultural and technological mingling of corporate Japan and the U.S. This chapter develops the notion that digital games are a site of intercultural communication by considering them as a part of the wider landscape of communication infrastructures that both facilitate communication across cultural, linguistic and national boundaries and shape the "content and form of contemporary media."[3] The global south has functioned as the "periphery" to various "centers" of network infrastructures that are located in the global north, where digital games are often produced and published.[4] This exploration of the way digital gaming directly connects the nations of the global south, enabling south-south connections, adds to the welcome growth of work on digital game production and consumption in the global south, and outside the English-speaking world, more generally.[5]

This chapter reports on data from a "situated" comparative ethnographic project, involving long-term participant observation and interviews with select participants. The project was conducted between March 2005 and February 2006 in research sites in Melbourne, Australia and Caracas, Venezuela.[6] The two field sites were both commercial cybercafés in which among other activities, people used to conduct network gaming, both on the local-area networks (LANs) in the cafes and with people in remote locations. The Caracas field site was Cybercafé Ávila, a small café with 11 working PC computers, placed close together in cramped conditions. The internet speed was relatively fast, the main technical issue was the age and capacity of the computers, only two of the computers had specifications which meant it was possible to play contemporary AAA new releases like *The Sims 2* (Maxis, 2004). Cybercafé Ávila was located on a residential street in the area of Caracas called San Bernardino, just north and east of the more well-known, historic La Candelaria neighborhood. This area of was largely developed by European immigrants during Venezuela's era of post-World War II prosperity.[7]

1. Tae-Jin Yoon and Hyejung Cheon, "Game Playing as Transnational Cultural Practice: A Case Study of Chinese Gamers and Korean MMORPGs," *International Journal of Cultural Studies* 17.5 (2014): 469-483.
2. Mia Consalvo, "Console Video Games and Global Corporations: Creating a Hybrid Culture," *New Media & Society* 8.1 (2006): 117-137.
3. Lisa Parks and Nicole Staroseilski, "Introduction," *Signal Traffic: Critical Studies of Media Infrastructures* (Illinois University Press, 2015): 1.
4. Steven Kline, Nick Dyer-Witheford and Greig de Peuter, *Digital/Play: The Interaction of Technology, Culture and Marketing* (McGill/Queen's University Press, 2003).
5. Thomas Apperley, *Global Rhythms: Play and Counterplay from the Situated to the Global* (Institute of Network Cultures, 2010); Dal Yong Jin, *Korea's Online Gaming Empire* (MIT Press, 2010); Larissa Hjorth and Dean Chan, *Gaming Cultures and Place in the Asia-Pacific* (Routledge, 2009); Nina Huntemann and Ben Aslinger, *Gaming Globally: Production, Play, and Place* (Palgrave, 2013); Bjarke Liboriussen and Paul Martin, "Regional Game Studies," *Game Studies* 16.1 (2016); Phillip Penix-Tadsen, *Cultural Code: Video Games and Latin America* (MIT Press, 2016); Mark J. P. Wolf, *Video Games Around the World* (MIT Press, 2015).
6. I have previously written about other aspects of this fieldwork in: Thomas Apperley, "Venezuela," in *Video Games Around the World*, ed. Mark J. P. Wolf (MIT Press, 2015); and Thomas Apperley, "Digital Gaming, Social Inclusion, and the Right to Play: A Case Study of a Venezuelan Cybercafé," in *The Routledge Companion to Digital Ethnography*, eds. Larissa Hjorth, Heather Horst, Anne Galloway and Genevieve Bell (Routledge, 2017).

The Melbourne site was Cydus, a medium-sized cybercafé located close to the central commercial district. Cydus was composed of two adjacent rooms, each with approximately 30 computers. One room was set up as a more generic cybercafé, catering to backpackers, tourists and international students, and the other was focused on gaming. Cydus had a relatively fast internet connection that was superior to many people's domestic connections, which meant that in 2005-2006 people often went there to play *World of Warcraft* (Blizzard, 2004), rather than playing from home. Cydus was situated across from the Queen Victoria Market, a high-profile tourist destination, and is proximate to many restaurants, bars and backpacker-style tourist accommodations. The area is readily accessible from the city center and from the student housing around the University of Melbourne and RMIT University to the north and east, as well as the gentrified suburb of North Melbourne. This area of Melbourne has a high proportion of immigrants, who are predominantly Cantonese speaking.[8]

The large proportion of international students living in the area around Cydus, mainly from China, Taiwan, Singapore and Malaysia, created a demand for networked games that were popular in East and Southeast Asia. As noted by Will Balmford, et al. in this volume, this cohort of players used gaming to stay connected with home during their periods of study in Australia. Notable were popular South Korean-made "freemium" massively multiplayer online (MMO) games like *Fly For Fun* (Webzen, 2005) and *Ragnarok Online* (Gravity, 2003) and the pay-to-play *ROSE Online* (TriggerSoft, 2005). The café also stocked prepaid game cards for *Ragnarok Online* so that players could purchase items using microtransactions in the Kafra Shop. These games were installed on the same computers alongside more standard (to the Anglophone world) networked games such as *City of Heroes* (Cryptic Studios, 2004)*, Defense of the Ancients* (Blizzard, 2003) and *World of Warcraft*. International students played these games and others, and Australian locals also played some of the South Korean games, most notably *Fly For Fun*. But it was the international students that choose to play these games deliberately to reconnect themselves with people in other countries, making the cross-cultural and transnational context of networked gameplay apparent.

Cybercafé Ávila operated as a part of Venezuela's substantial informal or "gray" economy. It was an off-the-books small business,[9] which offered miscellaneous digital network services, including computer repair, pirated software, software training, CD and DVD burning and printing. The eleven computers in the cafe were not standardized, and had different games installed on them according to their capacities. They were constantly being upgraded and repaired, often by transferring parts from other computers, making Cybercafé Ávila a locally-maintained, neighborhood "DIY" type of infrastructure, operating with a frugal ingenuity similar to many local cybercafés throughout the global south.[10] One computer was so old it was used for MSN and Yahoo! "chat" only, however most of the computers had *The Sims 2, Grand Theft Auto: Vice City* (Rockstar Games, 2002) and *Age of Empires II: The Conquerors* (Ensemble Studios, 2009) installed. The South Korean MMO *MU Online* (Webzen, 2002) and the German MMO *Tibia* (CipSoft, 1997) were also installed on most computers, but they were very rarely played. But the suite of games available in Cybercafé Ávila was more varied than that at Cydus, not just because they weren't constricted by copyright issues, but also because they were responsive to individual requests from regular customers, who were often also friends and neighbors. This meant each computer would have different games installed depending on past use, which would eventually be removed if they weren't subsequently played by other customers.

---

7. Apperley, *Global Rhythms*, 57-62.

8. Ibid., 62-65.

9. Jairo Lugo and Tony Sampson, "E-Informality in Venezuela: The 'Other Path' of Technology," *Bulletin of Latin American Research* 27.1(2008), 102-118.

10. Padmini Ray Murray and Chris Hand, "Making Culture: Locating the Digital Humanities in India," *Visible Language: The Journal of Visual Communication Research* 49.3 (2015): 141.

The most striking similarity between the desktops of computers in Cydus and Cybercafé Ávila was the game *GunBound: World Champion* (Softnyx, 2005; *Gunbound* hereafter), which was then in beta. *GunBound* was developed by the Seoul-based, South Korean company Softnyx. The beta was released in 2003, and it was launched in South Korea, Indonesia and China later that year. Each portal had a localized servers and was translated into local languages, while an "International" English-language portal was also established. By March 2005, when the fieldwork in Cybercafé Ávila began, *GunBound* already had portals connecting players to local servers in China, Indonesia, Japan, Taiwan, the Philippines and Vietnam. It also had a specific Spanish-language "Latino" portal. The game was officially launched over 2005-2006. In North America it was available through the ijji online gaming portal as *GunBound Revolution* (Softnyx, 2006) from 2006-2009. Since 2009 the game has only been available through Softnyx servers. In July 2017, *GunBound* was released as a free mobile game, retitled as *GunBoundM* and available through iTunes and Android.[11]

This chapter will first explicate the features of *GunBound*, as played on the International portal, which made it a feature that Cydus and Cybercafé Ávila have in common, with reference to the structure of the game, salient elements of the practices of players, technical aspects of how the game is served locally and internationally and the in-game virtual economy. Then, the chapter will shift to examine how the technical infrastructure of *GunBound* and the social networks, knowledges and practices of players facilitate south-south connections through gaming.

THE APPEAL OF GUNBOUND: WORLD CHAMPION

Playing *GunBound* extends outside of the game environment because of the important preparatory steps taken before the players enter the game environment and begin team-based combat. The main steps are:

- Avatar customization. Each player controlled a Manhwa (Korean print comic/cartoon aesthetic similar to Manga) style avatar, which they initially chose, then customized from templates. The avatar could be further customized by purchasing Avatar Items at the Avatar Store using one of *GunBound*'s two in-game currencies. Avatar Items could be purely aesthetic, or might also have an in-game effect.

- Vehicle selection. During combat, each avatar used one of sixteen vehicles (which were discussed as "mobiles" in the cyber café) with mounted guns. While the vehicle could be changed from game to game, it was fixed once combat had begun. Each vehicle came with specific strengths and weaknesses that created environmental advantages and disadvantages. Some vehicles required very specific tactics, which were difficult to master.

This wide range of potential choices meant that this ostensibly simple *Worms*-like 2D game had sophisticated nuances which demanded that players developed a large repertoire of skills and knowledge in order to play *GunBound* effectively.

These variables also establish several areas of mastery within the overarching game that make it so that players with different interests, levels of skill and gaming backgrounds can accumulate, share and display their gaming capital.[12] With gaming capital, Consalvo defines a specific form of "social capital,"[13] which is developed through experience, and by gaining skills and knowledge of digital

---

11. Alex Walker, "Gunbound Is Back As A Mobile Game," *Kotaku Australia*, 5 July 2017, https://www.kotaku.com.au/2017/07/gunbound-is-back-as-a-mobile-game/.

12. Mia Consalvo, *Cheating: Gaining Advantage in Videogames* (MIT Press, 2007).

13. Pierre Bourdieu, *Distinction: A Social Critique of the Judgement of Taste* (Routledge, 1984).

games. Gaming capital suggests that the player's experience of digital play is not just limited to interactions with a piece of software. Rather, digital play also imbricates players in larger circuits of meaning through both the integration of information from other sources and interactions with other players.[14] The accumulation of gaming capital often involves developing a suite of secondary skills in order to display one's prowess among the community of players. These can range from minor technical knowledges, such as how to take a screenshot or upload a video to YouTube;[15] through to relatively advanced traditional literacies found in text walkthroughs and creative writing inspired by digital games, like the after-action report;[16] to more technical activities such as modding, level design and the creation of machinima.[17] This chapter suggests that it is also important to consider how the nebulous skills and knowledges indicated by gaming capital underpin the integration of transnational infrastructures into the everyday experience of digital game players.

The significance of the cybercafé in the production and sharing of gaming capital with *GunBound* was notably different between the two fieldwork locations. In Cybercafé Ávila, the location, was itself, an incredibly important site for sharing information between players in a manner similar to that outlined by Jerjes Loayza in his chapter in this volume, dealing with more recent observations from a cybercafé in Lima, Peru. The exchanges in Cybercafé Ávila also suggested that competition and cooperation were imbricated in these spaces (see Pierre-Alain Clèment's chapter this volume). In Cydus, playing *GunBound* did not involve other people in the café, it was played across the network with players in other locations.

The *GunBound* avatars are persistent and remain tied to each player's account. After the game, each winning player is rewarded with "gold," the in-game currency. This meant that, as players became more experienced and acquired more gold, the time spent shopping for items for their avatar became lengthier. Shopping was much less time-dependent than playing, which meant that people often took their time deciding on their next purchases. The Avatar Shop has many items with different in-game effects that players often required advice, either from a *GunBound* walkthrough, FAQ or forum, or in some cases from other players in the cybercafé. These Avatar Items could enable special tactics that would shape future iterations of play, so consulting among teammates on purchases was also common. This meant that playing *GunBound* wasn't just about the actual moments of the game, but an ongoing consideration of how to re-invest winnings from the game into producing more effective avatars. For those playing in the global south where personal computers are less common, having an account where avatar purchases can be stored allows the meaningful development of an avatar in a way which players might not otherwise have access to through an AAA commercial game. This is because AAA commercial games traditionally rely on players being able to save games and return to the same computer to reload them.

Players must also choose a "bot" or vehicle for the avatar to use. This vehicle can be changed from game to game, and each of the sixteen possibilities has three individualized weapons, each with their own unique trajectories, range and effects, as well as specific strengths and vulnerabilities. The player's familiarity and skill with the game was particularly salient when choosing the vehicle, because the vehicle selected had a large impact on the player's affordances within the game and their potential role within a team. Some vehicles were considered to be good ones for novices to learn the game,

14. Thomas Apperley, "Understanding digital games as educational technologies," in *Popular Culture, Pedagogy and Teacher Education: International Perspectives*, eds. Phil Benson and Alice Chik (Routledge, 2014), 46.

15. Chris Walsh and Thomas Apperley, "Researching Digital Game Players: Gameplay and Gaming Capital," in *Proceedings of IADIS International Conference Gaming 2008: Design for Engaging Experience and Social Interaction*, eds. Y. Xiao and E. Ten Thij (Amsterdam: IADIS, 2008): 99-102.

16. Souvik Muhkerjee, "Videogames as 'Minor Literature': Reading Videogame Stories through Paratexts," *GRAMMA: Journal of Theory and Criticism* 23 (2016): 60-75.

17. Thomas Apperley and Catherine Beavis, "A Model for Critical Games Literacy," *e-Learning & Digital Media* 10.1 (2013): 1-12.

while others were considered to be so difficult to use effectively that they were only appropriate for expert players. Novice players were directed toward vehicles like the "ArmorMobile" and "Grub," because the aim of their primary weapons is less affected by "forces" (each turn in *GunBound* is shaped by one of eleven "forces"), while accurate aim is required with a few of the available vehicles, like the "Boomer" and "NakMachine," making them difficult even for experienced players to use effectively. Choosing a vehicle also requires much consideration and consultation, because in team play (the majority of *GunBound* play is team vs. team) the combinations that the abilities of the various vehicles would create when used together is salient. The usefulness of particular vehicles was dependent on the tactical approach planned. Coordinating the vehicles was relatively important for success in the game, and the process facilitated contact between players in the same team, both locally and across networks. When ongoing discussion and negotiation is necessary to successfully play a game, it can enable intercultural contact, even across language barriers, due to the highly functional nature of the communication.

During this selection and configuration process the players also had access to several in-game messaging channels. To begin playing, one player must first set up the game by opening and naming a "room." Then other players can join the "room" either as team members or opponents. This usually involves a short wait, as more players joined from various other locations. If the "room" took too long to fill, some players might leave in order to pursue solo or one-on-one play, which had much shorter wait times.

The play of *GunBound* involves the players in short but intense turns that cycle around the participants. Each lasts for a maximum of thirty seconds and each game has between two and eight players, so the turns could be as infrequent as every four minutes, creating the possibility of using time within the game for other activities. Often team members having taken their turn would begin to discuss tactics, or exchange other light-hearted banter and "smack talk." Some players would use the gap between their turns to conduct a brief flurry of chat exchanges using MSN or Yahoo! Messenger. The turn-based play of *GunBound* established a rhythm of intensive competitive play, interspersed with waiting and reflective pre-game decision-making around avatar purchases and vehicle selection suited the social milieus of Cydus and Cybercafé Ávila. Players that were setting up games or waiting for them to start would discuss *GunBound* or more general topics. In this socialization, *GunBound* was sometimes neglected as players got distracted by other activities and overlooked their commitments to their teams. By leaving space for socialization, *GunBound* was structured in a way that facilitated intercultural contact in order to fill the awkward silences of the waiting periods in the game.

The servers within the International portal were organized by level of avatar, according to the way that avatar abilities could be used. First, servers are designated as "beginner," "free" and "newb-free": beginner servers are closed to avatars above the required level, while free servers are open to all avatars and the newb-free serves have a required minimum avatar level to enter. Second, servers are divided into those which were "avatar on" and "avatar off" servers: in the "avatar off" servers the Avatar Items purchased for avatars were "turned off," while they still appeared as a part of the avatar's appearance the made no change to the power and abilities of the avatar; conversely, in the "avatar on" servers these purchased Avatar Items are fully operational. This categorization of servers creates many different contexts of competitive play. The divisions between servers created by limits on avatar levels, allows newer players to choose to avoid being grossly underpowered, and likewise experienced players to make sure they find suitably challenging opponents. The division between "avatar off" and "avatar on" servers created a way for players to excel based on skill or on a combination of

skill and experience, a factor which is crucial for engaging players from a variety of socio-economic backgrounds.

The virtual economy of *GunBound* was a freemium game, a distribution model that was pioneered by South Korean MMOs at the time. In this model *GunBound* was made freely available to download and play, with publisher profits derived by making small in-game purchases called microtransactions available to players. To counter the perceived unfairness of microtransactions, the international portal for *GunBound* includes two key levelers that make it possible for all freemium players to enjoy the game on a more-or-less equal footing with those players who use microtransactions. First, by having "avatar off" servers that rendered all purchased Avatar Items inoperable, players could compete on an equal footing in the game based purely on knowledge and ability, without interference from economic inequality. Second, because of the dual-currency virtual economy with a set exchange rate, players with different economic backgrounds are also able to compete more equally in the "avatar on" servers. The items at the Avatar Shop can be both purchased with "gold" that is won during play, and with "gcoin" microtransactions with real money. Many items at the Avatar Shop are only available to those players who have access to "gcoin," but because of the possibility of controlled exchange between the virtual currencies, which means that "gcoin" can be purchased using "gold," even if this requires a substantial investment in time from the players purchasing "gcoin." How gaming capital is understood across these contexts is varied, but because of the construction of the virtual economy there is always a space for players who are invested in a competition that based on pure skill and performance and action, without being impacted by economic disparity. The emergence of such models in commercial game design is of great significance to gamers in the global south as it removes issues of cost and digital rights management which have effectively kept players in many areas in local silos, unable to play in official competition or servers.

In Venezuela, the focus was on purchasing Avatar Items that had in-game effects, while purchasing a cosmetic item was considered a waste of money. However, for some players using Avatar Items to personalize their avatar was equally as important as purchasing items with in-game effects. In Australia, if the economic dimensions of the game were discussed at all, the main issue that arose was a general distaste for microtransactions. One interview participant who admitted that her boyfriend had made microtransactions on her behalf, carefully emphasized that the items only customized her avatar's appearance. In part the disdain was caused by the preference in both Cybercafé Ávila and Cydus was for playing in the "avatar off" servers. How players used Avatar Items in the expression of gaming capital through their avatar was considered important. While microtransactions were not regarded as "cheating," using microtransactions to purchase gcoin-only Avatar Items was regarded as not understanding the game's "spirit." Of course *GunBound* is characterized by a wide variety of attitudes towards play among its players, but a significant element of gamers respect the ideal of equal competition between players in disparate locations. This ties their gaming capital to an ability to understand the structural issues of negotiating uneven infrastructures, both from a point of privilege and as underprivileged users.

SOUTH-SOUTH CONNECTIONS ON *GUNBOUND*'S INTERNATIONAL PORTAL

The International portal was favored at both Cybercafé Ávila and Cydus because people believed that more skilled players congregated on that portal. Playing on local or regional portals was not seen as a good choice for serious players who wanted a challenge and to develop their skills through competition. However, playing on local portals was justified in particular circumstances. For example, the Latino portal was often used by group of friends playing together in Cybercafé Ávila, as they were

"just playing for fun" and wanted to be able to include more novice players who would find a Spanish-language interface more usable. At Cydus, one interview participant described how she would play practice games with her friends on a local portal before shifting to play on the International portal. The importance of the International portal for *GunBound* players again illustrates how gaming capital was closely tied to global access. While people may choose to play *GunBound* for a variety of reasons, including "making do" with it, it was possible to "make do" with it because the game was able to connect people around the world on even terms across uneven infrastructures.

National identity was also important on the International portal. In both fieldwork sites some players were deeply invested in identifying their avatar as belonging to a player from a particular nationality, or in some cases, linguistic background. Nationality was asserted with one or more of many items available for purchase with "gold" or "gcoin" in the form of a flag or other national symbol, e.g., a Panda. Establishing language identity required the deliberate deployment of language in the game. While national identity was often a source of pride, it also encouraged rivalry between players which mimicked existing prejudices. In her chapter in this volume, Verónica Valdivia Medina observes that Venezuelans were the most universally reviled Latino players on the servers she observed; likewise, in the fieldwork for the present chapter, Venezuelan players often mocked players from other countries, particularly the people of Colombian descent among them in Cydus. National languages were also used to open new channels for cheating, by using an ostensibly public space to conduct private chat as well as, unsurprisingly, in "smack talk." For these reasons, many other network games such as *Tibia*—but not *GunBound*—enforced linguistic conformity in their public chat channels, although players could address each other in whatever language they chose in their private talk. This openness to different languages was a part of the appeal of *GunBound*, as players did not feel excluded from the game even if they were in a linguistic or cultural minority on the portal in which they were playing.

While public communication in the International portal was in English by default, this was not policed, and many different languages mingled in the chat channel. The design of *GunBound* meant that joining a game did not require complex communication, and could be managed through software by both the joining player and the person who had set up the "room." Speaking different languages mainly inhibited the sociality that took place between players during the game while they were waiting for their turn. During play, what was typed into the chat channel by the player also appeared in a cartoon balloon over their avatar's head. This resonated with the Manhwa aesthetic found in other aspects of *GunBound*, and had a performative element that was endorsed by many players at Cybercafé Ávila and Cydus; likewise, in the wider culture of players, it was an element of the game that was often celebrated online in various player-productions.[18] Emphasis in the performance was on the timing and execution of an appropriate comment, so that it would appear in response to something which had just occurred in the game: the death of a team member, hitting an enemy, a new environmental force, etc. The most celebrated performances were when the player made a comment which appeared after their vehicle had been destroyed and their avatar was eliminated but was still in the process of being airlifted from the gamespace. At this moment, managing to time a snide remark to the opposing team or a word of encouragement to remaining team members was admired.

The South Korean origin of *GunBound* is salient. Although it was published in multiple locations in local languages, it had a recognizable origin in South Korea. In part this is from the clear Manhwa aesthetic, but also from its association with a suite of popular freemium South Korean MMOs that used a similar payment model, such as *ROSE Online, Fly for Fun, Ragnarok Online, Hero Online* and *MU*

18. Apperley, *Global Rhythms*, 112.

Online. Games like these pioneered freemium in the global market, at a time when MMORPGs were at their peak popularity globally, exemplified by the global popularity of the South Korean MMORPG *Lineage II*.[19] As many regulars at Cydus were international students that still had strong ties to the regions where these games were popular, they were familiar with and receptive to them. Staff in Cydus recognized that this type of game had a cache with their regulars and made sure that they kept up with key developments. In this way the cohort of international students in Melbourne, also described by Balmford, et al. in this volume, who used gaming as a way to connect to home, influence tastes in gaming more generally by opening local players to new repertoires of games. For example, the South Korean MMO *ROSE Online*, which was released in December 2005 during the fieldwork period, was installed on every computer in the cafe on the day of its release, making it a significant event for all regulars, not just international students.

In Cybercafé Ávila, rather than connecting a mobile population of gamers back to networks from their home countries, people were attuned to gaming developments originating in South Korea other reasons. In Venezuela, South Korea in general had a large cultural cachet, particularly in terms of luxury cars and appliances, the latter of which were often sold in dedicated *Corea* stores that stocked a range of appliances from Daewoo, Hyundai, LG and Samsung. In addition to this generally positive disposition towards South Korean products, the relative graphic simplicity of games like *MU Online* and *GunBound* allowed them to function effectively on the local infrastructure, characterized by low GPU computers and fluctuations in network speed. The freemium model that many South Korean games used also suited the economic situation of many of the players at Cybercafé Ávila, who had no access to the credit cards which were essential for many subscription-based games. *GunBound*, in particular, mitigated many of the issues of being a free-to-play player alongside others who used microtransactions by having a fixed exchange rate between the earned "gold" currency and the purchased "gcoin" currency.

At Cydus, *GunBound* players often played with people located in the Asia-Pacific, while in Cybercafé Ávila, they tended to play with people in other Spanish-speaking Latin American countries, or occasionally with people in North America. As Balmford, et al. have also demonstrated in this volume, the role of international students is crucial in facilitating the connection between Australia and the Asia-Pacific. The fieldwork in Cydus further suggests that connection was also strengthened by the synchronized time zones of Australia and Southeast and East Asia. Australia shares time zones with China, Hong Kong, Indonesia, Japan, Malaysia, Philippines, Singapore, South Korea and Taiwan, along with many other countries in the Asia-Pacifc. This means that from Cydus, it was relatively easy to play with people from these countries, as no special effort was required to find a time to play which was mutually suitable since the daily rhythms of work, study, leisure and sleep were roughly synchronous. At Cybercafé Ávila this was also true, as the networks were more regionally oriented within North and South America, sharing several synchronized time zones: Venezuela is 30 minutes ahead of EST (Eastern Standard Time), putting it in roughly the same time zone as Bolivia, Chile, Colombia, Cuba, Ecuador, Peru, the populous east coast of the United States and the Canadian provinces of Ontario and Québec.

The proliferation of local *GunBound* portals might suggest a splintering of players into multiple local and regional communities. However, these same local and regional portals enable the strengthening national and linguistic ties across global networks. This networked gaming becomes one way that national community is maintained and even how national identity is expressed. This suggests that the

---

19. Constance Steinkuehler, "The Mangle of Play," *Games and Culture* 1.3 (2006): 199-213; Dal Yong Jin and Florence Chee, "Age of New Media Empires: A Critical Interpretation of the Korean Online Game Industry," *Games and Culture* 3.1 (2008), 38-58.

capacity of network infrastructures to connect locations, across national and geographic boundaries, is enabled by knowledge that is formed and developed through shared practices of gaming.

CONCLUSION

Play across national boundaries using unevenly developed infrastructure in Venezuela, Australia and other countries was made viable by *GunBound* being a low-data game that put very little pressure on infrastructure and could thus be downloaded, installed and played on a large number of networked computers without unwanted complications. Its ubiquity at the time meant that it was a common point of experience for many people who spent time in cybercafés in distinct points throughout the globe. *GunBound* was structured to enable real-time communications, deliberately incorporating the communicative cultures of players into the game. But what made *GunBound* a useful tool relative to many other available games was its role in facilitating social relations across uneven network infrastructures. This made *GunBound* and other similar games open up the possibility of connecting locations in the global south, as well as establishing horizontally-organized constellations across the north and south, but within proximate time zones.

People at Cydus chose to play *GunBound* not just because they wouldn't experience lag, but because whomever they were playing with would also, most likely, not experience lag. However, at Cybercafé Ávila choosing to play *GunBound* was a case of "making do," from among the various free-to-play and freemium games that were available, which would also allow them and their opponents to play with consistent speed across the relatively inconsistent regional network infrastructure. The design of *GunBound* kept the possibility of an "even playing field" open. The design features that contributed to this possibility were the dual currency and the separate servers for those that had used microtransactions and wished to experience the in-game advantage they had purchased. But also crucial was the attitude of the community of gamers, who saw the "avatar off" servers as demonstrating the "true spirit" of *GunBound* competition. This meant that the mechanics of *GunBound*, and its capacity to operate smoothly over uneven networks were crucial in developing and sustaining a gaming culture that valued the ability to communicate across national borders and between cultures.

ACKNOWLEDGEMENTS

WORKS CITED

Apperley, Thomas. *Global Rhythms: Play and Counterplay from the Situated to the Global*. Institute of Network Cultures, 2010.

—. "Understanding Digital Games as Educational Technologies." In *Popular Culture, Pedagogy and Teacher Education: International Perspectives*, edited by Phil Benson and Alice Chik, 36-52. Routledge, 2014.

—. "Venezuela." In *Videogames Around the World*, edited by Mark J. P. Wolf, 613-628. MIT Press, 2015.

—. "Digital Gaming, Social Inclusion, and the Right to Play: A Case Study of a Venezuelan Cybercafé."

In *The Routledge Companion to Digital Ethnography*, edited by Larissa Hjorth, Heather Horst, Anne Galloway and Genevieve Bell, 235-243. Routledge, 2017.

Apperley, Thomas and Catherine Beavis. "A Model for Critical Games Literacy." *e-Learning & Digital Media* 10.1 (2013): 1-12.

Bourdieu, Pierre. *Distinction: A Social Critique of the Judgement of Taste*. Routledge, 1984.

Consalvo, Mia. "Console Video Games and Global Corporations: Creating a Hybrid Culture." *New Media & Society* 8.1 (2006): 117-137.

—. *Cheating: Gaining Advantage in Videogames*. MIT Press, 2007.

Hjorth, Larissa and Dean Chan, eds. *Gaming Cultures and Place in the Asia-Pacific*. Routledge, 2009.

Hunteman, Nina and Ben Aslinger, eds. *Gaming Globally: Production, Play, and Place*. Palgrave, 2013.

Jin, Dal Yong. *Korea's Online Gaming Empire*. MIT Press, 2010.

Jin, Dal Yong and Florence Chee. "Age of New Media Empires: A Critical Interpretation of the Korean Online Game Industry." *Games and Culture* 3.1 (2008): 38-58.

Kline, Steven, Nick Dyer-Witheford and Greig de Peuter. *Digital/Play: The Interaction of Technology, Culture and Marketing*. McGill/Queen's University Press, 2003.

Liboriussen, Bjarke and Paul Martin. "Regional Game Studies." *Game Studies* 16.1 (2016).

Lugo, Jairo and Tony Sampson. "E-Informality in Venezuela: The 'Other Path' of Technology." *Bulletin of Latin American Research* 27.1 (2008): 102-118.

Mukherjee, Souvik "Videogames as 'Minor Literature': Reading Videogame Stories through Paratexts." *GRAMMA: Journal of Theory and Criticism* 23 (2016): 60-75.

Murray, Padmini Ray and Chris Hand. "Making Culture: Locating the Digital Humanities in India." *Visible Language: The Journal of Visual Communication Research* 49.3 (2015): 140-155.

Parks, Lisa and Nicole Staroseilski. "Introduction." In *Signal Traffic: Critical Studies of Media Infrastructures*, edited by Lisa Parks and Nicole Staroseilski, 1-28. University of Illinois Press, 2015.

Penix-Tadsen, Phillip. *Cultural Code: Video Games and Latin America*. MIT Press, 2016.

Steinkuehler, Constance. "The Mangle of Play." *Games and Culture* 1.3 (2006), 199-213.

Walker, Alex. "*Gunbound* Is Back As A Mobile Game." *Kotaku Australia*, 5 July 2017, https://www.kotaku.com.au/2017/07/gunbound-is-back-as-a-mobile-game/.

Walsh, Chris and Thomas Apperley. "Researching Digital Game Players: Gameplay and Gaming Capital." In *Proceedings of IADIS International Conference Gaming 2008: Design for Engaging Experience and Social Interaction*, edited by Y. Xiao and E. Ten Thij, 99-102. IADIS, 2008.

Wolf, Mark J. P., ed. *Video Games Around the World.* MIT Press, 2015.

Yoon, Tae-Jin and Hyejung Cheon. "Game Playing as Transnational Cultural Practice: A Case Study of Chinese Gamers and Korean MMORPGs." *International Journal of Cultural Studies* 17.5 (2014): 469-483.

LUDOGRAPHY

Blizzard. "Defense of the Ancients," *WarCraft III: Reign of Chaos*. Blizzard, 2003.

—. *World of Warcraft*. Blizzard, 2004.

CipSoft. *Tibia*. CipSoft, 1997.

Cryptic Studios. *City of Heroes*. NCSoft, 2004.

Dargőm Studio. *GunBoundM.* Apple/Google, 2017.

Ensemble Studios. *Age of Empires II: The Conquerors*. Microsoft, 2000.

—. *Age of Mythology: The Titans*. Microsoft, 2003.

Gala Lab. *Fly For Fun.* Webzen, 2005.

Gravity. *Ragnarok Online*. Gravity, 2003.

Maxis. *The Sims 2.* EA Games, 2004.

Rockstar North. *Grand Theft Auto: Vice City*. Rockstar Games, 2002.

Softnyx. *GunBound World Champion*. Softnyx, 2005.

—. *GunBound Revolution*. Softnyx, 2006.

Team 17. *Worms*. Team 17, 1995.

TriggerSoft. *ROSE Online*. Gravity Interactive, 2005.

Valve Corporation. *Counter-Strike: Source.* Valve Corporation, 2004.

Webzen. *MU Online*. Webzen, 2003.