

An Overview of Institutional Support for Game Students in Higher Education

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ABSTRACT

What are some factors that contribute to the success of a game program? The curriculum and how it is taught, the way a program is organized, and understanding game students are all important factors. There is an additional aspect: the role that extra-curricular initiatives and supports play. We report on an interview study where game educators discussed the things their game programs do outside of the classroom to support and help their students. These efforts are grouped into initiatives that contribute towards strengthening a community of learners, those that help students develop their professional identities, efforts for broadening student's experience, and managing/creating relationships with the game industry. By presenting and collecting these initiatives we can identify possible gaps in a program and encourage a more holistic perspective on higher education focused not only on the curriculum, but also on those things that can happen in between or adjacent to coursework.

Keywords

Game education, higher education, game programs, town hall, mentoring, awards, scholarships, Game lounge, playtesting, showcase, workshops, speaker series, advisory board, industry sabbatical, game jams

INTRODUCTION

An increase in demand for knowledge, skills, and training for people with an interest in making and studying games has led to more institutions of higher learning offering classes and degrees related to games and game development. What are some of the factors that contribute towards the success of a game education program? Answering this question is neither straightforward nor simple. Fortunately, the increase in game-related curricular offerings has also been accompanied by a desire to share experience, knowledge, and best practices.

Such sharing (and critiquing) has occurred across a variety of venues including, but not limited to, publications, presentations, workshops, and panels at academic conferences (e.g. DiGRA, Foundations of Digital Games – FDG); research published in academic journals (e.g. Game Studies); presentations at game industry events (e.g. Game Educator's Summit at the Game Developers Conference (GDC)); and the organization of special interest groups (e.g. IGDA Education SIG). Broadly speaking, these efforts have emphasized three aspects of game education:

1. Curriculum: what can/should game programs teach and how to best do it?
2. How can/should a game program be structured and organized?
3. What role does the game student play in their education and how can they best be served?

Proceedings of DiGRA 2020

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The first aspect (curriculum) has been explored primarily through the presentation of curricular designs. For example, how to best teach puzzle design (Fay, Schell, and Clark 2019) or how to run capstone courses (e.g. Zagal and Sharp 2011; Stephenson et al. 2016). Different techniques have also been explored for teaching existing classes or topics, such as having students develop custom game controllers (Schwartz 2011), using German-style boardgames to help teach game mechanics (Hullett, Kurniawan, and Wardrip-Fruin 2009), how to teach students to pitch games (Altizer and Zagal 2014), or a sample assignment developed to help students practice integrating story with game mechanics (Zagal and Lewis 2015). More broadly we have also seen discussions of what not to teach (Zagal 2012) and what key pedagogies should be used in game education (Waern 2013).

The second aspect presents a broader organizational view of games education. For example, Fullerton (2006) provides game education lessons learned at the University of Southern California while Isbister and colleagues shared their experience developing multiple game programs at different institutions (Isbister, Zimmerman, and Consalvo 2019). Murray et al (2006) argued for the importance of humanistic approaches to game studies curricula and others have argued for, and described, their own interdisciplinary game programs (e.g. Argent et al. 2006; Zyda 2006; Kessler, van Langeveld, and Altizer 2009). Other work has also examined the relationship between game program curricula and the needs of the game industry (e.g. McGill 2009; Ip 2012) or looked at how games education occurs in specific cultural contexts (e.g. Zagal 2013; Geyser 2018). Also, the IGDA Education SIG has released multiple versions of its curriculum framework – “a practical document [...] designed to assist educators and students, from the creation of individual courses to the development of full degree programs” (IGDA 2008).

There is perhaps less work examining the role of game students in their education. Ashton looked at “the changing relationships games design students describe with digital games and games technologies” (Ashton 2010) while Zagal and Bruckman studied the challenges that game students face as they learn about games and game development (Zagal and Bruckman 2009).

Most games education research thus far has not addressed the kinds of things that game programs can or should implement alongside, in-between, or adjacent to their coursework to better support their students (for exceptions, see T. Fullerton 2005; Consalvo and Altizer 2014). This article looks to address this issue by presenting some program-level non-curricular supports and initiatives currently used by game programs worldwide. This is a starting point towards developing insights, best practices, and a better understanding of which supports may be more effective and impactful in game education. Additionally, this work represents a first step towards conceiving game programs in a more holistic fashion – not by de-emphasizing the curriculum and coursework, but rather by recognizing that a lot of learning happens outside of the classroom and thinking about how a game program can encourage and support that learning.

METHODS

In order to gain a better understanding of the kinds of support game programs provide their students outside of the classroom, we interviewed ten people who teach/work in games education at the undergraduate and/or graduate level. Interviews were conducted remotely (e.g. Skype, phone), lasted between 30 and 50 minutes, and were also

recorded and transcribed. Interviewees were contacted and selected based primarily on availability and interest in response to invitations to participate posted on forums and venues (e.g. mailing lists, conferences) known to be frequented by game scholars and educators (e.g. DiGRA, GDC, IGDA education SIG).

A semi-structured interview protocol was used during the interviews. Using a semi-structured protocol ensures that all the participants are asked the same questions while allowing flexibility so additional issues may be explored if they come up. The interview protocol also provided the opportunity towards the end of the interview for participants to ask questions of their own.

The protocol used includes questions such as:

- Could you please describe the game program you participate in?
- Tell me about some of the things that exist outside of classes to help students.

As mentioned, interview participants were invited to ask questions of the author. This often led to further follow up questions. The goal of these interviews was to get a sense of the breadth and scope of different extra-programmatic supports used in game programs. Interview participants were asked to exclude those supports that were University-wide (e.g. generic scholarships). Rather, they were asked about supports that were managed directly by the game program.

Once the interviews had been conducted and the transcripts were ready, data analysis was done in an iterative fashion using open coding. In open coding, codes (labels) are assigned to interview answers, or in the case of extended answers, parts of answers. These codes can overlap with others and oftentimes multiple codes may be assigned to some answers. As additional transcripts were coded, new codes might emerge and existing codes might be modified or consolidated. This process is conducted many times until no new codes emerge. The idea is that the process of grouping and consolidating codes that refer to the same idea (or have similar meaning) allows underlying themes to be brought to light. Thus, the process of open coding can be used to identify possible themes deep inside the data (Neuman 2000).

This study was limited in the number of interviews and the participants should not be construed as being “representative” (in the statistical sampling sense) of the broader population of people who teach/work in games education. However, the results of this study serve to illustrate the diversity of initiatives, options, and things that many game programs currently implement to support their students outside of the classroom. As such, this study’s findings can still be useful and interesting to consider. However, the findings presented here should not be construed as necessarily indicative of the importance, significance, effectiveness, or popularity of any of the options or approaches presented. Although the rationale for implementing many of the supports is discussed and there were clear instances of most/many programs implementing similar ideas, the supports described here should be taken as descriptive (i.e. “these are some of the things other people do at their institutions”) rather than normative (i.e. “these are things that it would be good/bad for you to implement at your institution”).

Lack of Anonymity

Prior to the recruitment of participants or any other data collection, approval was obtained from the University of Utah’s ethics review board (IRB). This is standard practice for this kind of research in order to ensure that the appropriate safeguards and protocols are in place to protect the research participants from harm and unnecessary risk. One common safeguard is to anonymize personally identifying information of the participants by, for example, using pseudonyms instead of their real names. However,

in this kind of research there may be moments in which anonymizing the identity of research participants might not be appropriate – for example when the research participants may deserve credit and recognition for their work and/or their contributions to the research (Bruckman 2002).

For this study, we felt that there was a possibility that participants would share information regarding their programs and institutions that others might want to replicate or adopt in their own institutions. Thus, it was important that participants (and their institutions) could potentially receive the recognition and credit they deserve if they so desired. So, the interview protocol used included two questions asking the participants if they wished their identity and that of their institution not be anonymized.

All ten participants indicated that they did not want their identities anonymized. Thus, all of this studies participant contributions are cited and referenced as “personal communication” using their names. The participant’s organizations are not presented because they often reported on their experiences at multiple institutions, rather than only the one they were currently employed at. The study participants are, in alphabetical order: Drew Davidson, Allan Fowler, Susan Gold, Jessica Hammer, Velli-Matti Karhulahti, José Luis Soler, Samuel Tobin, Henrik Warpefelt, and Hanna Wirman.

FINDINGS

Study participants reported on a variety of initiatives that we have loosely grouped into four broad categories based on the main purpose or reason for their implementation. This does not mean that these initiatives have a single purpose or reason for their use. Many initiatives in fact overlap the categories we present. The groupings presented are merely for clarity.

Community

It is known that creating a sense of belonging to, and participating in, a community, can be conducive to better and longer-lasting learning (e.g. Lave and Wenger 1991). As such, many of the study’s participants reported on the different ways they try to encourage and nurture communities of learners at their institutions. Many of the initiatives described below are also used to provide opportunities for students to learn and practice the values of particular program – thus they serve a communicative function in addition to one of community.

Most of the study participants described how they engage in efforts to foster, encourage, and support *Student Groups*, clubs, and similar organizations in their activities. *Student Groups* are run and organized by students rather faculty or staff (Gold 2018) and they come in a variety of sizes and represent a diversity of interests as well). For example, there might be general game-playing clubs¹, fan-interest groups (e.g. Hearthstone club), groups interested in practicing/developing skills (e.g. Game Development club), support and feedback (e.g. Art critique), playtesting, organized play organizations (e.g. e-sports clubs), and groups dedicated to advocacy and/or diversity initiatives (e.g. Gaymer organizations). In terms of how game programs support their *Student Groups*, this can take the form of funding (e.g. paying for pizza and snacks), access to space, and providing administrative support (e.g. printing flyers and posters, emailing announcements). Since *Student Groups* are usually only provided help when they ask for it (Fowler 2018), it is important that they are made aware of the kinds of support a game program is willing to provide.

While the benefits that students perceive from participating in *Student Groups* will vary, broadly speaking, the positive effects of supporting student socializing should not be underestimated. Amongst other things, *Student Groups* can provide opportunities for students who are at different phases of their education to interact with and learn from each other. Clubs can be a great way for “institutional knowledge” about a program to be handed down from more experienced students to those who are just starting their education. Similarly, they can also allow for learning to happen in contexts and ways that are more authentic to professional/industry practice (Shaffer and Resnick 1999). While these *Student Groups* are “bottom-up” initiatives that arise directly from student efforts, the role that faculty and administration can play in supporting them is often critical to their success.

Casual Lunch Meetups are organized by some programs as a way to create opportunities for students to meet each other but also get to get to know their faculty. They can occur as frequently as once a week to once a month but the idea is generally the same – bring your own lunch and chit chat with faculty and students while you eat (Gold 2018). Opportunities for faculty and staff to informally interact with students are seen as a strong way to create community, and also get a sense of what things are working (or not) in the program.

Many programs have seen the value in creating and maintaining program-specific channels of communication between the program and others. The easiest to maintain are newsletters and mailing lists for announcements and general information that can be made available to students, alumni, and friends (Karhulahti 2019). Many programs also reach out and communicate via Twitter, Facebook groups, Slack channels, and Discord servers. However, other initiatives, such as hosting *Town Hall Gatherings*, are more involved. These are large meetings, generally scheduled at the beginning or end of a term, where people in the program talk about where things are going, and also, crucially, listen to complaints, issues, and concerns from the audience. Samuel Tobin describes how at these meetings “[w]e talk about what’s going on in the program. We came up with it because we found we really needed to tell people what was happening” (Tobin 2018). These meetings are useful for providing information that is important to students (rather than information interesting to higher administration). For example students might want updates on how certain courses will run/work (e.g. “Will we be forced to use a certain technology in the capstone class?”), changes to curricula and course offerings, or updates on staffing (e.g. “Who is going to teach class X next semester?”). *Town Hall Gatherings* can also be useful for addressing rumors that might be circulating and to allow students to talk about real problems they might be concerned with such as diversity, getting internships, toxic culture issues (e.g. gamergate), and so on. Despite the fact that “[they] can get contentious” (Tobin 2018), *Town Hall Gatherings* can be valuable for strengthening trust and camaraderie between the faculty/staff and students.

Having a *Mentoring Program* can also be valuable. Inter-disciplinarity is common in many game programs and this means that students often have different disciplinary backgrounds (T. Fullerton 2005), varying expectations on how to do things, and differences in what a learning experience should look like. Thus, opportunities for students to receive one-on-one support can be valuable in helping them navigate their game program and succeed. Drew Davidson describes how “every student gets assigned a faculty mentor, ideally lined up with their interests. [As faculty] you take on like five students a year” (Davidson 2018). The role of the mentor is to make sure that students are on track and help with advice. Faculty also meet about once a month to chat about their mentees and discuss any issues or concerns they might see (Davidson 2018). Since mentors have a closer relationship with the students, and generally know them better than other faculty, they can also serve as a “check”. For example, mentors

can give input on student team composition (e.g. these two students should probably not work together) (Davidson 2018). Also, mentorship is kept separate from grading (Hammer 2018).

Another common initiative is to have formal means of recognizing and rewarding students. For example, *Student Awards* and *Game-Specific Scholarships* are great for making concrete those things that a program values and wants to reinforce. These are distinct from scholarship/awards programs that the institution might offer to the student population at large since they are either specific to game program students, or to games themselves. These initiatives can be useful in attracting the kinds of students a program desires. For example, “Women in Games” or diversity scholarships are common, often with the help of industry partners (e.g. Soler 2018; Davidson 2018). There is a lot of variation with game programs offering awards and scholarships for academic achievement, diversity, e-sports and more.

Most study interviewees stated that non-class related physical spaces for students to occupy was important. Perhaps the most common term used was the *Game Lounge*: a place for students to relax, socialize and play games. These kinds of spaces commonly have couches, bean bags or other comfortable furnishings as well as large screens, game consoles, and board games. The *Game Lounge* does not necessarily require an entire room – sometimes an area within an existing space can suffice (Wirman 2019) and it can also serve as hub or central meeting place for students in the program (Tobin 2018). When a *Game Lounge* is decorated and painted in a distinct way, it can encourage a sense of identity for students in the game program as they recognize it as a space that is unusual and different from other spaces on campus (Tobin 2018).

The final, and perhaps most common, type of community-related extra-curricular initiative that game programs engage in are spaces or moments that allow students and faculty to share their work with each other and broader communities. The two most common are *Playtest Events* and *Showcase Events*. The former are events in which student games are made available to play for formative evaluation. In other words, the idea is for attendees to play games that are currently under development such that the students working on them can get feedback to help identify problems and so on. The latter are intended to “show off” the work students have completed. There is a wide variation in style and format for *Showcase Events*. In some, the games shown have been through a juried selection process and students must submit their games knowing that not all the submissions will meet a certain threshold or bar of quality. Some showcases only show games that have been developed as part of a class, while others are open to any/all student games (e.g. personal projects). There might be awards, game industry guests, and speakers. Some *Showcase Events* are open to the public and others are not. In terms of duration, these events can be as short as a few hours during an evening, while others go on for several days. As an example of a larger event in terms of size, scale, and scope, Henrik Warpefelt describes the Gotland Game Conference, hosted by the department of game design at Uppsala University: “[we’ve] been running that in different incarnations over ten years” (Warpefelt 2018). The event has “one day for the judges and then it’s open to the public” (Warpefelt 2018); it features a public show floor (where you can play student games), talks by developers and academics, an awards ceremony, and a party (Warpefelt 2018).

Professional Identity

Learning is more than the “simple” acquisition of knowledge and experience. Learning can also be described as a process of identity formation. This is especially true in higher education in that the “college years” represent a moment during which many of the foundational elements of student’s professional identity, and the societal expectations of a professional’s public duties are laid down (Arnett 2000; Bebeau and Monson

2012). In other words, this is when game students begin to see themselves as game developers (and/or game scholars), rather than “simply” students.

Thus, it is not surprising to see a variety of initiatives designed to help students develop and grow in their professional identities as game developers, creators, and more. Perhaps the most common are initiatives designed to support student awareness of, and attendance and participation in, *Industry Events*². This can include sharing information about events, providing funding support, and helping students with applications. For industry events that are local, some programs may have a stand or booth at the event as well. Industry events can include those that are oriented towards industry professionals as well as those open to the general public (Soler 2018). In the case of travel support (e.g. stipends to help cover expenses), many programs use ad-hoc solutions, but generally the idea is to support students as much as possible, especially when they have something to demo/show at the event. For example, support is more likely when students have a game accepted to a festival, or they have been invited to give a talk. Some programs have a budget set aside for these purposes and as requests come in during the year the funds are assigned (e.g. Davidson 2018; Warpefelt 2018). However, simply providing monetary support isn't enough, and students might be expected to meet with a mentor or faculty member to help them get the most out of the event (Hammer 2018). While the Game Developers Conference (GDC) is often seen as “the main event”, in practice many programs benefit more from smaller local events. These can include hosting and supporting meetups for local International Game Developers Association (IGDA) chapters (Gold 2018) or promoting “Happy Hour” meetups with local developers and alumni (Wirman 2019).

Some programs also choose to directly sponsor *Industry Events*. Allan Fowler describes how “we sponsor an event called SIEGE [...] which is run by [...] the Georgia game development association.” (Fowler 2018) One of the benefits of sponsorship is that it comes with a set of passes, which are then mostly passed along to interested students (Fowler 2018). Furthermore “we also sponsor an event called FutureX Live that is more related to AR/VR projects. We organize our students to go along and present. It's run and hosted by a local advertising agency called Moxie” (Fowler 2018).

Attending *Industry Events* is important for socialization and networking with industry professionals. These events can often lead to internships or employment opportunities for students. However, students are not necessarily prepared to make the most of these opportunities. So, many programs organize efforts to help with *Interview & Internship Preparation*. These efforts include a number of activities starting with the collections and dissemination of internship and job postings, CV and portfolio reviews, mock interviews, and also visits from HR representatives from local companies for feedback and insights (e.g. things to avoid in your cover letter). Oftentimes these efforts are led by dedicated support staff (Hammer 2018). Some programs run panels with industry professionals for help and feedback for students. José Luis Soler describes how at his institution they organize a “Portfolio Week” in which “students go through a panel and get feedback from specialists in their area. If you're a 3D modeler or rigger, you get specific feedback” (Soler 2018). This was particularly useful in his program because “students are always delaying their portfolios” and by making attendance required of students, they were able to ensure “they finished the term with a polished portfolio” (Soler 2018).

Broaden Experience

Educators are well aware of the limitations that designed curricula and a classroom setting have. For example, meeting twice a week for 90 minutes may not be the ideal amount of time for students to learn and reflect on certain kinds of topics. Similarly, the kinds of experiences that students can engage in a classroom, laboratory, or the like

are also constrained by the affordances of space. There is no such thing as a space and schedule that is ideal for all classes, topics, etc. (Lei 2010). Thus, educators also often look to ways to provide students with opportunities to practice and develop skills they might not otherwise have a chance to engage with in a “regular” class (e.g. lack of time, materials, etc.). Similarly, there are often attempts to provide opportunities for students to strengthen skills they might already have outside of the classroom.

In terms of resources, the *Game Library* is perhaps the most common with programs making concerted efforts to purchase, maintain, and loan games to students. These are considered resources for research rather than entertainment, and they allow students to broaden their knowledge of games beyond those they play for their own entertainment and pleasure. While some institutions work directly with their university library, many manage their own collections, loaning games only to their students or only making them available to play on-site. Many *Game Libraries* are located close to (or within) the *Game Lounges* described earlier (e.g. Wirman 2019).

Another common support is the use of *Assistantships*. Broadly speaking the idea is that students are hired or engaged to support existing curricular efforts. For example, by teaching regular classes (e.g. a PhD student might teach an undergraduate level class, thus gaining experience and deepening their knowledge and understanding), serving as graders or lab assistants in classes taught by regular faculty, or also by engaging with faculty research projects and initiatives (Gold 2018). These initiatives are not exclusive to game programs and are quite common across campuses.

Game Jams are another common way for allowing students to practice and develop skills. A game jam, broadly speaking, is an event in which people design and create games from scratch in a limited amount of time (e.g. 48 hours), subject to design constraints (e.g. follow a theme), and whose results are publicly shared (e.g. with other jam attendees) (Kultima 2015). These can vary in size and scope, with some game programs integrating with existing game jam initiatives – for example participating in the Global Game Jam or the online-only Ludum Dare. Similarly, some programs host *Game Jams* that are open to the public (for increased networking opportunities) while others might be limited only to students in the program. In terms of frequency, some programs host one *Game Jam* a year, while others might have several during each academic term. There is also research that supports the idea that game jams can be beneficial for students (as well as professionals) for both learning technical skills as well as social ones (e.g. Preston et al. 2012; Fowler et al. 2013; Smith and Bowers 2016). Additionally, *Game Jams* can support collaboration across different student age groups and areas of specialization, and can help prepare students for internships and interviews – for example, by providing a way for students to articulate their game development experience with narratives that demonstrate skills, experience, and reflective practice (Soler 2018).

Part-Time Work Support is the idea that students can learning can benefit when they actively engaged in professional work while also continuing their studies. Many programs maintain close relationships with local game studios such that they can offer “guaranteed” internships for a certain number of students. Other programs have created their own internal development studios – a University-owned game studio that works on its own projects (often tied to funded research grants) that hires students to work (Fowler 2018).

Some programs organize extra-curricular *Workshops* – narrowly focused teaching/learning experiences that are designed to address specific needs of a sub-set of the student population. These are both opportunities to get some students “up to speed” on a certain tool or technique, complement an existing class, or allow students

to “brush up” on skills they might feel are lacking. Jessica Hammer describes how in her program they “run all kinds of workshops! We have the festival competition workshop, we have a branding one, playtesting, production. Every week there are like two workshops – not all are for all students. Many of them are optional” (Hammer 2018). For example, in the “Competition Workshop” students get help writing the materials they need to submit their games to festivals and competitions (e.g. a 4-page abstract). Students are also shown examples that are analyzed so that students can replicate them in their own projects (Hammer 2018).

Some programs also hold game program specific *Speaker Series*. These are regular talks (a few every term) given by invited guests and faculty on a diversity of topics. There are a variety of ways these can be organized but overall educators have found that consistency matters – ideally talks are evenly spaced out during the term, occur on the same day of the week at the same time and place. This sort of consistency means that they can be integrated more easily into course activities (e.g. students in an intro class might be required to attend a few talks over the semester). Similarly, it is important that the talks exhibit diversity along a variety of dimensions – for example representing different roles/jobs of the game industry (e.g. art, engineering, production), combining industry speakers and academics, and style of presentations (e.g. informative, experience-sharing, inspirational), and also including under-represented groups. In some programs they have found that inviting alumni to share their experiences has been particularly productive – they can provide an effective (and aspirational) role model for students, and alumni often feel honored to be invited and are happy to “give back” (Wirman 2019). A speaker series can also be a helpful tool to strengthen relationships with the industry since they present an opportunity for the speaker to get to know/visit the program, meet with students, and see what they’re working on and such. Many educators have found that industry professionals often have misconceptions about what game programs do, and visiting one (to give a talk) is a convenient way to dispel some of those misconceptions.

Finally, there are *Study/Field Trips*. Hanna Wirman describes how, when she was at Hong Kong Polytechnic University, she would organize *Study/Field Trips* to off-campus locations to help students gain new perspectives, see things “in the flesh”, or to gain access to behind-the-scenes opportunities. *Study/Field Trips* might include visits to local studios or companies, but can also include play spaces (e.g. stadiums, arcades, barcades, etc.). At Hong Kong Polytechnic “we also have field trips to local events. Like, interactive art exhibitions [...], art exhibitions, we go to see festivals, [and other] game entertainment related events” (Wirman 2019).

Industry Relations

With the assumption that many (though perhaps not all) game students have an interest in working as professional game developers it is no surprise that many game programs have initiatives designed to strengthen (or create) relationships with the wider game industry.

Perhaps the most commonly discussed initiative is the existence of an *Advisory Board* or steering committee. This is a group of 5-7 game industry professionals the program can refer to or consult with for big picture issues or concerns with the program. For example, an *Advisory Board* can serve as a sounding board for significant curricular innovations or to gauge a sense of directions the industry might be heading in that could be anticipated or prepared for by the program (e.g. game metrics seems like an area of rapid growth, how could students learn /develop skills that might help them to work in this?). While the specifics vary from program to program, most *Advisory Boards* favor a mix of local and non-local professionals (with the non-local ones flown in for meetings) together with diversity in terms of role (developer/publisher), size (indie,

AAA), and platform (console, mobile, etc.). Alumni are also a good source for *Advisory Board* members and having academics from other programs can also be useful (Davidson 2018). Ideally the advisory board meets once or twice a year, often coinciding with significant program milestones (e.g. final student presentations).

Some programs highlight the importance of *Hosting Industry Events*. For example, providing space and resources for local IGDA (International Game Developers Association) chapter meetups. This, of course, assumes the existence of a local chapter (and local industry presence). However, these can be complemented with regular alumni social events – some that might not even be on campus. Some programs have found success in organizing alumni meetups at game conferences (e.g. GDC, DICE, PAX, etc.) as opportunities for alumni to interact, but also allowing industry guests/friends to participate.

The *Industry Sabbatical* is also an interesting program. The idea is that an industry professional is “in-residence” with the game program for a limited amount of time, thus on sabbatical from their regular industry job. Susan Gold describes one such implementation for a short (3 months or less) program in which the “pro gets a small stipend and must work with students for X amount of time” (Gold 2018). The idea is that the professional works on a personal project (e.g. a small indie game) that can receive input/assistance from students, but more importantly the professional can participate in critiques of students work, playtesting, and also in providing feedback.

DISCUSSION AND CONCLUSIONS

For anyone currently involved in games education at the university level, or higher education in general, we imagine that some of the initiatives described above were not novel or surprising (see Table 1). Hopefully, a few were. More broadly, we hope that presenting and collecting them in this way can help identify possible gaps in a program or encourage a more holistic perspective on higher education – focused not only on the curriculum and learning goals attached to different courses, but also those things that can, should, or perhaps already happen in between or adjacent to coursework.

Theme	Extra-Curricular Initiatives
<i>Creating/Strengthening Community</i>	Student Groups, Casual Lunch Meetups, Town Hall Gatherings, Mentoring Programs, Student Awards, Game-Specific Scholarships, Game Lounge, Playtest Events, Showcase Events
<i>Developing Professional Identity</i>	Supporting Industry Events, Interview and Internship Preparation
<i>Broaden Experience</i>	Game Libraries, Assistantships, Game Jams, Part-Time Work Support, Workshops, Speaker Series, Study/Field Trips
<i>Industry Relations</i>	Advisory Board, Hosting Industry Events, Industry Sabbatical

Table 1: Summary of Extra-Curricular Initiatives Organized by Theme

This work is also a call to consider and imagine new kinds of extra-curricular supports that game programs could implement in the future. Perhaps there are different ways that we might imagine the relationship between the game industry and game programs. These might need to take into account the differences within the industry where, say working as an independent developer might be fundamentally different than the AAA industry or the mobile industry. Similarly, there are lots of game programs currently wrestling with how to support, integrate, or relate to e-sports initiatives (Kauwelo and Winter 2016). With some programs providing dedicated spaces for e-sports (e.g. Warpefelt 2018), what will the overall impact on student's extra-curricular learning be? Additionally, there is a need to better understand and assess the impact of current initiatives such that best practices can be developed and shared across institutions. From this perspective, there is still further work that needs to be done to understand how game students themselves perceive, understand, value, and take advantage (or not) of the extra-curricular activities that are offered. Are there perhaps certain game student populations that are excluded or not seeing some of their needs addressed? How could they also be served? As game educators we often focus on the importance of what we do in the classroom, lecture hall, or lab. However, we are also pretty good at creating and developing things to support our students outside of the classroom – the sorts of things that require broader institutional support. In this sense, it is important to remember that learning does not happen in isolation and that the context in which a game program exists and the discourse that surrounds it might be more impactful to a student's learning experience than the courses themselves.

ACKNOWLEDGMENTS

We would like to thank Robert Kessler and EAE for their support in making this work happen as well as the DiGRA anonymous reviewers for their comments and suggestions for improvement. Preliminary findings from this work were presented at the Game Educators Summit of the Game Developers Conference 2019.

ENDNOTES

¹ These can provide insights for professors curious to know what is going on in the local gaming scenes (Karhulahti 2019).

² See also *Hosting Industry Events* section.

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