

Roots, Branches & Vines



What Museums Can Learn from the Gaming Sector

Jessica Doig

Museums may find unexpected inspiration from the gaming sector, which has flourished by staying true to its roots, keeping the audience at the heart of every decision and adapting its process along the way.

Roots

At the root of any game is a keen focus on play: an experience that delights, entices, and demands your attention. At the root of any museum experience is a keen focus on storytelling: an experience that educates, enlightens, and engages visitors. Games evolve while staying true to their roots by amplifying play in game-changing ways, while museums can evolve by amplifying stories.

Social Connection

The gaming sector has capitalized on the opportunity for social connection through play. Multi-player video games engage friends that are physically located together or strangers who are located around the world. Game design has evolved to the universal human need for connection, made possible through cloud computing. Museums are already a social en-

deavor where visitors have collected themselves under one roof for a shared experience. Museums can optimize this social opportunity, whether through digital media experiences that are designed to spur story-driven social interaction on site or the opportunity for virtual visitors to interact through technology with onsite visitors.

Outside the Walls

Virtual reality video games and the proliferation of mobile devices have created a virtual playground for gamers wherever they go. City streets become the setting for scavenger hunts, mystery games, and virtual warfare. Strangers they pass on the street may be allies, conspirators or adversaries. The gaming sector has succeeded in moving the play experience beyond the confines of a gamer's home. Museums have an opportunity to reinforce their relevance outside their walls. Before the visit, the website could be the first step to unlock the museum's many stories rather than a logistics and wayfinding tool. During the visit, visitors could collect stories for a digital takeaway to read more later. After a museum visit, visitors could receive location-aware prompts on their mobile device when they encounter an object or place that is relevant to the museum story.

Role Playing

Just as young children love to play dress up, gamers have long enjoyed the chance to personalize their game experience through role-playing. Today's games create role-playing opportunities through virtual reality 3D worlds where players engage in an alternate reality. Similarly, museums can allow visitors to personalize their experience in such instances where the visitor becomes a character within the story and then follows that character's experience throughout the museum visit. When the visitor identifies as that character, they have a new lens for viewing the collections and a new relatable perspective to understand the story. This character-driven storytelling also encourages repeat visitors so that the visitor can experience more than one perspective on the story that is presented.

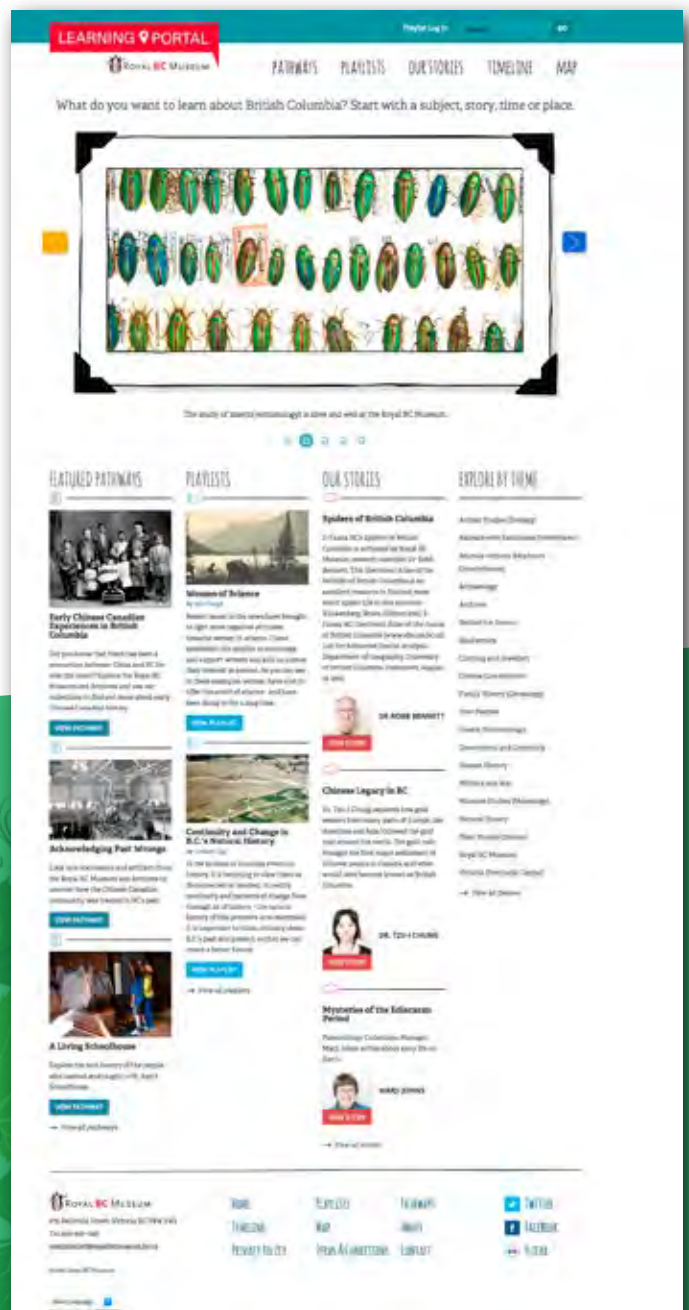
Branches

The gaming sector has a successful history of serving its core audience well: adolescent males. However, in order to grow, the sector needs to attract new audiences while staying relevant to their core. The challenge is that the sector risks either losing its more fervent followers if they feel abandoned in pursuit of the new audiences or losing all audiences by a game designed for no specific audience. The key to their success has been a highly selective pro-

cess of targeting new audiences for specific games, while utilizing metrics to ensure they are keeping their core audience happy.

New Audiences

The gaming sector specifically targets new audiences, whether that new audience is teenage girls, "silver gamers", "mom gamers", or parent/child combined gamers, with a focused effort to design experiences specifically for them. Similarly, museum design for new audiences will mean that not all exhibits will appeal to all visitors. A traditional mu-



Right: The Royal BC Museum Learning Portal, created by the Royal BC Museum and NGX Interactive, extends the storytelling experience beyond the walls of the museum before and after a visit. Photo credit: NGX Interactive



seum visitor may eschew digital media exhibits and seek out artifacts, interpretive panels and dioramas. In contrast, a teen visitor may walk right past traditional exhibits to join a hands-on workshop or engage with a digital touch table experience.

An exhibit can delight the visitor that was targeted, rather than trying to appeal to a shared middle ground.

Metrics

The rise of cloud computing has allowed developers to track gamer behaviour and use this data to inform design efforts. This focus on metrics takes the guesswork and assumptions out of how gamers are playing games and replaces this with meaningful data on what is and is not working. Studios have adapted by not only collecting this data, but

interpreting this data to inform iterations of existing games development as well as choices for new games. Similarly, museums have a potential treasure trove of information on visitor behavior made possible through the rise of digital media exhibits. Data tracking allows museums to collect aggregate data on patterns of visitation such as dwell time, visitor flow between exhibits or galleries, and the comparative popularity of a variety of digital content. Smart use of this data promotes an understanding of visitor preferences and allows for the museum to make adjustments to retain existing visitors as well as attract new ones.

Vines

Like a vine, game design is adaptive, persistent, and resilient. Driven by agile methodologies, it is responsive to new information. Much like museum planning and design, the process of designing

Top: *The Gold Rush: El Dorado in BC* exhibition at the Royal BC Museum, created by NGX and the Royal BC Museum, included a game where visitors are matched with a character from the gold rush and are encouraged to seek out relevant artifacts from the neighboring exhibits. Photo credit: NGX Interactive

Right: *The Magna Carta exhibition's digital globe.*
Photo credit: Lord Cultural Resources

and creating a new game is lengthy and expensive. During this process, it is essential to manage resources, budgets, and schedule, all while staying focused on the end result. The challenge for both industries is the pace at which things change: audience expectations, consumer habits and technological innovations.

Agile Methodology

The gaming sector has stayed relevant amid the sea of change by utilizing agile methodologies that allow for flexible iterative design throughout the development process. Rather than a strict gate check process from start to finish, game design stays open to new information and has a system to adapt to those changes. Museums can learn from the gaming sector in order to adapt to a more flexible process. Within a museum design cycle of 1-2 years, the technology available for digital media exhibits may change radically. Agile methodology would allow for adapting to new information that comes available, rather than designing based on the constraints of technology that is a few years old.

Prototyping

End user feedback is essential to the design of both video games and museum exhibits. Prototyping within the gaming industry allows for beta testing of games. Similarly, for museum design, prototyping of exhibits allows for visitors to inform the design process while there is still time to make adjustments. Prototyping for a digital media exhibit can take a few forms: paper prototyping of the on-screen experience, rapid prototyping of the fabricated exhibit and beta testing of the software experience.

Transparent Design

Transparent game design takes the ideas of agile methodology and prototyping further, where



brands seek gamers to help design games and even co-create games. For example, Xbox Preview can be purchased by gamers to play games before they are completed. Other games allow for fans to co-create games, offloading the cost of development to an engaged audience that is thrilled to participate. This idea is already gaining traction in the museum world, with exhibit designers sharing early stage plans via social media. The end result is not only designs that are better suited to the audience, but an engaged community that is involved throughout the museum design process. Co-creating takes the idea of transparent game design further, where visitors can shape the future of museums.

Jessica Doig thrives on the convergence of business strategy, design aesthetic, technical knowledge, and interpretive storytelling in her role as Vice President of NGX. Armed with her PMP Certification and a UBC Science Degree, Jess balances her formal qualifications with her passion for creativity and innovation.

