## **Location Based Elements into Gaming Industry**

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## **Abstract:**

The gaming industry is at a tipping point, where the real world is becoming the playground. In 2018, we could see many location-based games (LBG) such as Yokai Watch World<sup>1)</sup>, Jurassic World Alive<sup>2)</sup>, and Walking Dead Our World<sup>3)</sup> in the gaming market (Figure 1), after Google launched the Google Maps Platform for Real World games<sup>4)</sup> at Game Developer Conference 2018. Further, the location-based element can be added for the existing game or made the other genre of the game as well. Hence, it realized that the LBG could provide huge potential for gaming industry.

In the presentation, I am going to discuss about how maps work for Real world game throughout the existing game and demo. It includes the basic requirement of the Mapping features from Game developers and its future collaboration with related technology such as AR (Augmented Reality)/ VR (Virtual Reality). Here are the main requirements that most of game developers needed when they build a LBG.

- 1. Easy to deploy without geospatial knowledge
  - The platform should provide a Vector 3D mapping data via Native Game Engine such as Unity3D and Unreal Engine or even original game engine. So, it should be provided by a native plug-in for the game engine loaded in client side to make a game object.
- 2. Styling features for all vector data (Point, Polyline, and Polygon)
  - The main components of the vector data should be roads, buildings, and parks, where game developers need to customize any game element. For example, fill parks with trees, oceans with waves, and beaches with umbrellas. They also request to customize colours, textures, and the sizes of objects to create a game all their own.
- 3. Appropriate POI (Point of Interest) data suitable for the game world
  - Game developers might request to find player-friendly and appropriate places for game play. The POI data will support game developers drive your players to the real-world locations that make sense for your game.

In addition, many game developers are interested in the LBG and try to create new genre of the game. They will notice about the value of Maps as a reference point between a real world and Gaming world. For example, I believe that the location based Ads will become their next generation revenue resources instead of In-App purchase that they currently gained. Further, the combination of the real-world data, maturing AR capabilities and the explosive user growth on mobile are starting to enable experiences that span realities, leading to dramatically higher engagement.

## **References:**

- 1) Yokai Watch World, created by GungHo Online Entertainment/Level 5, https://youkaiww.gungho.jp/
- 2) Jurassic World Alive, created by Ludia / Universal, https://www.ludia.com/en/games/jurassic-world-alive
- 3) The Walking dead: Our World, created by Next games/AMC, https://www.thewalkingdeadourworld.com/
- 4) Google Maps Platform, https://cloud.google.com/maps-platform/gaming/

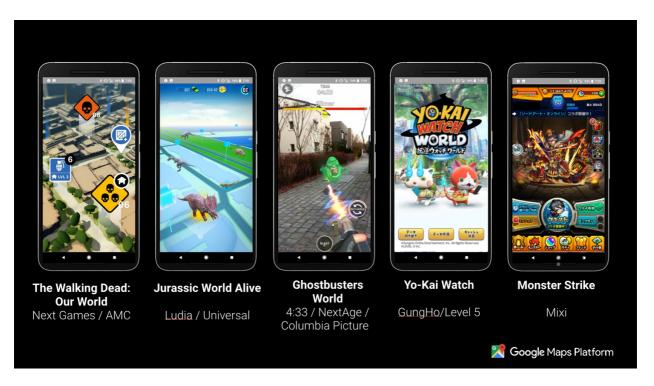


Figure 1. Launched LBG with Google Maps Platform

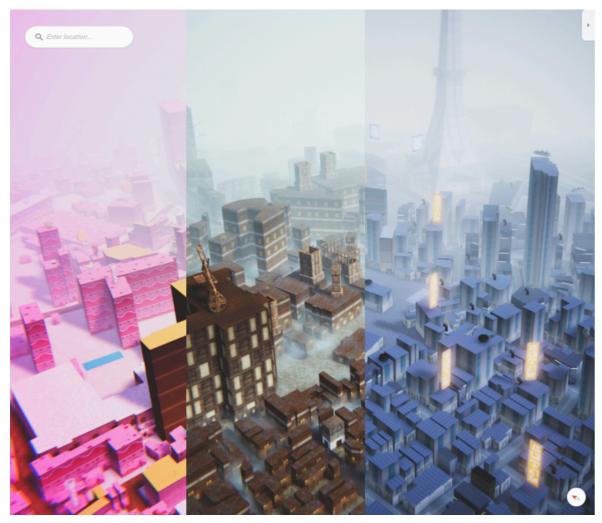


Figure 2. Styling features for game world