# IoT Smart Bell Notification System : Design and Implementation

WooHyun Park*, YunGyung Cheong**

**College of Information&Communication Engineering, Sungkyunkwan University, KOREA **College of Software, Sungkyunkwan University, KOREA*

**cgvt@skku.edu, aimecca@skku.edu**

***Abstract*—In this paper, We provide a security and security service that combines the functions of smart phone and home n etwork system. It enables users to check real-time visitors remotely by utilizing the doorbell function of the existing entrance door. It provides not only the act of opening and closing the door by simple visit, but also the function of acquiring the e vidence and reporting immediately when a crime occurs. While the existing doorbell system uses its own transmission protoc ol, Smart Bell uses a standard internet protocol.**

***Keyword*—Bell, Home Network , Internet of Things**

Woo-Hyun Park received the B.S. degree in 2016 in information engineering from Anyang University. In 2016, he is a graduate student at Sungkyunkwan University in South Korea. His research interests lie in the intersection of artificial intelligence games using VR/AR and user interfaces.

Yun-Gyung Cheong received the B.S. degree in 1996 and the M.S. degree in 1998 in information engineering from Sungkyunkwan University (SKKU). In 2007, she received the Ph.D. degree in computer science from North Carolina State University, Raleigh, NC, USA. She is an Assistant Professor at Sungkyunkwan University in South Korea. Her research interests lie in artificial intelligence with emphasis on its use in discourse planning for narrative, games, and user interfaces.