

## Chapter 7.3

# Factors Affecting WiFi Use Intention: The Context of Cyprus

**Despo Ktoridou**

*University of Nicosia, Cyprus*

**Hans-Ruediger Kaufmann**

*University of Nicosia, Cyprus*

**Christos Liassides**

*Columbia Management, Cyprus*

### ABSTRACT

*Wireless communications are here to stay; nevertheless, a number of individuals are still reluctant to use them for accessing the Web. This urges providers to better understand the concerns of consumers in order to better position the products and services in the market and to reduce the barriers that consumers may have in using WiFi – Wireless Fidelity Internet technologies. The present quantitative study was carried out for the purpose of assessing the effect of a number of constructs, identified in the past to affect the use of IT and WiFi use intention, as well as identifying the underlying factor structure of these constructs. It further aimed to assessing the overall attitudes and behavior of consumers towards WiFi use, as well as identifying and comparing WiFi users and non-users' overall behavior towards WiFi use and their perceptions of factors determining WiFi adoption.*

### INTRODUCTION

The ability to communicate from virtually anywhere and the convergence of web and wireless technologies offer an unprecedented level of flexibility and convenience, particularly, for

ubiquitous information access. WiFi internet technology changed the way that IT technology is conventionally used. Today, it is used by most PCs, operating systems, video game consoles, laptops, smart phones, printers, and other peripherals. All of a sudden, the use of technology became much easier and much more virtual than before. People

DOI: 10.4018/978-1-61350-101-6.ch703

can access and share information from any point, at any time, at their own convenience and pace.

Although the WiFi technology is a major achievement and provides more convenience to internet users than before, a number of individuals are still reluctant to use it for accessing the World Wide Web. Researchers in the field argue that final purchasing decisions are often the result of perceptions and attitudes that consumer hold towards products and services. It is therefore paramount for providers to understand the concerns of consumers in order to better deliver and position products and services into the market minimizing any hesitation that consumers have in using WiFi internet technologies.

Furthermore, although a number of studies have researched the impact of consumer attitudes on the use of new technologies (e.g. Davis, 1989; Moore and Benbasat, 1991; Compeau and Higgins, 1995; Thompson et al, 1991; Salisbury et al., 2001; Venkatesh et al, 2003), no research up to present has focused on the impact of the perceptions and attitudes of consumers towards the use of wire-free technologies, such as WiFi, Bluetooth, and infrared. Such technologies are incorporated into existing technological devices to make their use much more virtual and mobile, offering higher efficiency, ease of access and convenience. The present research was a first attempt to assess consumer perceptions towards wire-free technologies on the propensity and desire to use such technologies.

Finally, there is total absence in the literature of similarities and/or differences that exist between users and non-users of particular technology in terms of their overall attitude and perceptions towards this innovation and the factors determining IT adoption.

Consequently, this research aims to assess the effect of a comprehensive number of factors, identified in previous studies, which influence the intention to use information technologies on the willingness of consumers to use WiFi Internet technology. This study marries and synthesizes

the evidence from previous studies in the field and attempts, for the first time, to assess the concentrated impact of all forces, proven to affect IT use, on the intention to use WiFi. Moreover, the study will pursue to grouping these variables into a smaller more manageable set, with explanatory power relating to the intention to use WiFi.

Specifically, the study aims to:

- Identify the nature of factors that tend to affect WiFi use for accessing the Internet. There is a total absence, at present, of empirical evidence that examines the factors that tend to affect the use of WiFi for Internet access. Thus, the present research contributes to the literature in the sense that it reveals that set of factors with the highest impact on WiFi use for Internet access. Previous evidence relevant to the forces that affect the use of information technologies is integrated.
- Examine a full range of factors, at once, that have been identified in the past to affect use of IT. No research at present attempted to test the effect of all these factors at once, thus identifying the set of forces with the highest explanatory power. Hence, the research attempts to identify the individual, as well as the combined impact and explanatory power of a range of factors (revealed by previous studies) on the use of WiFi for Internet access purposes.
- Reduce the number of factors that have been revealed to affect the use of IT, into a smaller, more manageable set. Previous studies revealed a large number of forces with effect on propensity to use new technologies. The present study will capitalize on this evidence, attempting to use fewer dimensions or factors that can be used in an effort to explain the factors that impact on IT use.

20 more pages are available in the full version of this document, which may be purchased using the "Add to Cart" button on the publisher's webpage:

[www.igi-global.com/chapter/factors-affecting-wifi-use-intention/58867](http://www.igi-global.com/chapter/factors-affecting-wifi-use-intention/58867)

## Related Content

---

### Laws Associated with Mobile Computing in the Cloud

Gundars Kaupins (2012). *International Journal of Wireless Networks and Broadband Technologies* (pp. 1-9).

[www.irma-international.org/article/laws-associated-with-mobile-computing-in-the-cloud/90273](http://www.irma-international.org/article/laws-associated-with-mobile-computing-in-the-cloud/90273)

### Analyzing Small-Cells and Distributed Antenna Systems from Techno-Economic Perspective

Christos Bouras, Vasileios Kokkinos, Anastasia Kolliaand Andreas Papazois (2017). *International Journal of Wireless Networks and Broadband Technologies* (pp. 45-64).

[www.irma-international.org/article/analyzing-small-cells-and-distributed-antenna-systems-from-techno-economic-perspective/198516](http://www.irma-international.org/article/analyzing-small-cells-and-distributed-antenna-systems-from-techno-economic-perspective/198516)

### Emerging Technologies in Transportation Systems: Challenges and Opportunities

Antonio Guerrero-Ibáñez, Carlos Flores-Cortés, Pedro Damián-Reyesand JRG Pulido (2012). *International Journal of Wireless Networks and Broadband Technologies* (pp. 12-40).

[www.irma-international.org/article/emerging-technologies-in-transportation-systems/94552](http://www.irma-international.org/article/emerging-technologies-in-transportation-systems/94552)

### Evaluation of Long Term Evolution Cellular Network Performance when Transmitting Multi-view Video Content

Carl James Debonoand Gloria-Anne Ellul (2014). *International Journal of Wireless Networks and Broadband Technologies* (pp. 16-32).

[www.irma-international.org/article/evaluation-of-long-term-evolution-cellular-network-performance-when-transmitting-multi-view-video-content/121657](http://www.irma-international.org/article/evaluation-of-long-term-evolution-cellular-network-performance-when-transmitting-multi-view-video-content/121657)

### The Design and Modeling of 2.4 GHz and 3.5 GHz MMIC LNA

Ching Wen Yip (2012). *Advances in Monolithic Microwave Integrated Circuits for Wireless Systems: Modeling and Design Technologies* (pp. 157-184).

[www.irma-international.org/chapter/design-modeling-ghz-ghz-mmic/58491](http://www.irma-international.org/chapter/design-modeling-ghz-ghz-mmic/58491)