



LOG IN

Opinion

Achieving sustainable living with smart homes

PROF DR NUARRUAL HILAL MD DAHLAN

19-07-2024 07:45 AM



Digital systems and devices are designed to automate tasks and provide convenient control over various aspects of the home, making life easier for the residents. – REUTERS/PIC

MALAYSIA and China are set to sign a Memorandum of Understanding (MoU) aimed at developing smart homes, smart cities and urban planning ("MoU on housing, urban planning, smart cities to be inked with China, says Nga," The Edge Malaysia, June 18).

The upcoming agreement is expected to bring significant benefits to both countries by fostering collaboration and knowledge-sharing, leading to advancements in technology and urban planning that will mutually benefit Malaysia and China.

Furthermore, this collaboration will enable both countries to bolster their economic sectors, enhance skills and knowledge, create job opportunities and attract new investments in real estate development. This initiative is viewed as a means to strengthen the bilateral relations between Malaysia and China.

This effort will help Malaysia achieve the goals outlined in the Housing and Local Government Ministry's Strategic Plan 2021-2025, in reaching the objectives related to the 12th Malaysia Plan in urban development and housing for the people.

A "smart home" or "smart house" is a residence equipped with advanced technology, such as computers and digital systems. These technologies are designed to automate tasks and provide convenient control over various aspects of the home, making life easier for the residents.

Examples of smart home equipment, construction and facilities include CCTV, routers, automatic lighting control, alarm systems, sensors, intercoms, video conference facilities, smart televisions, smart lighting systems, smart thermostats, smart door locks and openers for garages, smart cameras and security systems, smart pet care and lawn care, smart kitchen appliances, smart household monitors and smart plugs.

The needs of a smart home depend on the requirements and preferences of its residents. A smart home can assist its occupants in living a more convenient, secure, cost-effective and efficient lifestyle.

Some smart homes are customised to cater to specific groups such as the elderly, individuals with disabilities, children and residents requiring special amenities to improve their quality of life, convenience and safety.

In Malaysia, several residential areas have been identified to provide smart home facilities and sold to the public. Smart homes are more expensive than normal houses because they come with special facilities.

The construction of a smart home requires approval from the local authority, which is subject to the provisions of the Street, Drainage and Building Act 1974 (Act 133), the Uniform Building By-laws 1984, and the smart home guidelines set by the authorities.

These rules ensure that the construction of smart houses promotes sustainable development. If developers fail to comply with these provisions, the Certificate of Completion and Compliance may not be issued and the house cannot be occupied nor sold to the public.

However, there are several challenges and issues in implementing smart homes.

The first issue concerns the cost of building and selling a smart home, which is typically higher than that of a regular house, making it only affordable for the wealthy.

The second issue is the additional maintenance and repair costs of smart home devices, which fall on the occupants. Smart home equipment usually comes with a limited warranty period, for example, two years, after which occupants must bear the cost of maintenance and replacement.

Importing smart home devices from abroad can be time-consuming and more expensive. Some residents find it complicated and end up resorting to manual methods instead of using digital tools.

The challenges of making smart homes accessible to all levels of society, especially those in the low-income groups, are significant. Additionally, the issue of smart home data hacking poses a threat to the security of smart home residents and needs to be taken into consideration.

The Housing Development (Control and Licensing) Act 1966 (Act 118) specifically refers to Schedules G, H, I, and J of the Housing Developer (Control and Licensing) Regulations 1989, which outline the formats of the statutory sale and purchase agreement.

Notably, there is no requirement under these schedules to provide a list of smart home facilities, smart home construction and smart home tools, especially under the second and fourth schedules.

Consequently, the absence of such requirements may lead to situations where the developer is not obligated to repair or replace smart home tools and facilities if they are damaged, found defective or unusable during the Defect Liability Period (DLP) within 24 months from the date of handing over vacant possession of housing units to the buyers.

Moreover, the lack of information and description of smart home equipment, construction and facilities in the statutory sales agreement can result in fraudulent practices by developers. This can occur when the smart home tools and facilities promised in posters, advertisements and brochures are not provided due to the absence of mandatory rules requiring the provision of such information and description in the statutory sale and purchase agreements. This situation can lead to losses for buyers and an inequitable scenario.

The writer suggests that the second and fourth Schedules to the statutory sale and purchase agreements (Schedules G, H, I and J) should include a list of smart home equipment, construction and facilities to offer fair protection and guarantees to smart home buyers. If not, damage and defects to the smart home facilities, construction and equipment may not be repaired or replaced by the developer during the DLP period because these matters have not been specified in the sale and purchase agreements.

Buyers can also be denied the right to claim compensation for the developer's negligence in providing smart home facilities and equipment, even though the limitation period for claiming damages due to negligence of the developers has been extended to 15 years as stated in section 6A of the Limitation Act 1953 (Revised 1981). These issues and challenges regarding the implementation of smart homes in Malaysia should be made known to the public.

In addition to the price and cost of smart homes, the issues of hacking smart home data and fraud should be addressed by incorporating specific clauses and terms in Schedules G, H, I and J, including a list of facilities, construction and smart home tools to protect the rights of buyers.

Implementing these proposed changes will boost public confidence and trust in smart homes and contribute to the successful and sustainable development agenda for the well-being of the public.

The writer is from the School of Law at Universiti Utara Malaysia and an executive committee of the Malaysian Academic Association Congress. Comments: letters@thesundaily.com

