Along the spine-jarring road that runs through this city on the shore of the South China Sea, in between the sparse, waterlogged shacks of corrugated aluminium and wood, colourful buildings have begun to shoot up. They tower over their low-level surroundings with dollhouse façades, painted in baby blues, sunshine yellows and ruby reds.

Sukadana, a small coastal community in western Borneo, is in the midst of a building boom. But the new houses are not for people. They are huge birdhouses playing an all-day siren call through booming speakers to a small bird whose edible nests - worth around £620 a pound - produce birds' nest soup, which is highly sought after in China.

"They actually look nicer than a lot of the real houses," said Andrew Teixeira de Sousa, field director for the Gunung Palung Orangutan Conservation Programme, which is active in the nearby Gunung Palung National Park. "But that's just because there's a lot more money going into those buildings."

The bird - the edible-nest swiftlet or Aerodramus fuciphagus - makes its nest by sticking long strands of viscous saliva onto a cave or house wall. These strands harden into a woven cup, weighing about a third of an ounce, that cradles the birds' eggs and, later, its nestlings.

Many Chinese believe that these hardened cups, when married with a stock, bring special health benefits. Some claim the nests can help fight disease, improve blood flow, strengthen the body, moisturise the skin and even help mothers recover their figures more rapidly after childbirth. One online company advises women to feed their babies nest fragments dissolved in milk to "give the infant a flexible mind".

Real or not, the supposed health benefits of the nests have allowed sellers to charge a premium price. Iskandar, a village official in Riam Berasap Jaya - who, like many Indonesians, goes by one name - said a good quality nest that had the classical cup shape and was free of dirt and feathers could fetch up to £15.

Iskandar, a former illegal logger, shares a land boundary with a swiftlet house. He has many friends involved in the trade and is saving up for one of his own. Since most of the forests in the area have been bought up for palm plantations, he said, the logging business is not what it once was.

The edible bird's nest has been part of traditional cuisine for centuries, but it wasn't until the advent of the CD player that the boom really took off, said Lim Chan Koon, of the University of Malaysia, the co-author of The Swiftlets of Borneo. Before then, people would venture into caves to gather the nests.
"Some wiseguy thought of using playback of the swiftlets' song to lure them into purpose-built structures imitating the cave environment," he said.

Once enticed inside, the swiftlets find an environment conducive to their nesting behaviour. Small openings in the back of the building allow them access but keep predators out. Holes allow air to circulate but keep crosswinds to a whisper.

There are large bird feeders, and open water tanks providing the birds with a place to bathe and drink. Temperatures are kept cool inside, even during the blistering heat of daytime, by automatic sprays, which humidify the air.

Getting started in swiftlet farming requires a significant amount of money. Iskandar said a medium-size three-storey swiftlet house could cost about £10,000, a massive sum for local people.

Still, the houses keep springing up. Almost every bend in the winding roads here reveals another. On some of the straighter stretches, the houses sit in clusters of three or four.

In the early morning and evening, when the birds return from foraging, the jostling around the entrances seems like an avian motorway junction - a black mass of thousands of birds, each entering and exiting faster than the human eye can track. And between the birds and the electronic calls, the chirping never ceases.

The total value of the nesting trade has been estimated in the tens of millions of pounds. "The birds' nest industry is in the informal sector of Indonesia's economy that is difficult to estimate," said Fauzi Ichsan, a senior economist with Standard Chartered Bank.

But the unregulated industry is also raising concerns that Indonesian swiftlet farmers could be producing more than just nests. Indonesia is acutely sensitive to bird-related disease scares. Since 2003, H5N1, better known as the virus that causes avian influenza, has caused 146 deaths and sparked global fears of a future pandemic, and the toll in Indonesia is the highest of any country, according to the World Health Organisation.

Some are concerned that the increasingly dense networks of swiftlet houses could create disease flightpaths for avian flu, threatening both the local bird populations and potentially people too.

Almost as worrying are the large water tanks inside each house that provide prime breeding sites for mosquitoes that could carry dengue fever and malaria - two tropical diseases of particular concern in Borneo.

The profusion of bird droppings that cover the buildings and the surrounding areas is also a concern.

"When it's dry, the wind will carry any particles and germs in it, possibly causing various respiratory diseases," said Trisasi Lestari, a doctor and researcher in the public health department of Gadjah Mada University. But on the roads around Sukadana, potential health concerns seemed secondary, and
swiftlet-house owners seemed more concerned with the flightiness of the birds themselves.
In Riam Berasap Jaya village, Budi sat in a sweltering room staring at a mostly blank closed-circuit television screen. A recording of bird calls screamed at high volume in the next room. It had been six months since his swiftlet house was finished, but only a few nests dotted the walls.

Luck, Budi said, played as great a role as preparation in swiftlet farming.

"You see," he said with a sigh, "you can entice an edible-nest swiftlet to a birdhouse, but you can't make it nest."