One man’s quest to improve the lot of fishermen – and fish

Conservationist Crispen Wilson is helping local Indonesians recover after the tsunami, but in a way that doesn’t deplete local fish stocks.

Banda Aceh, Indonesia — On the new concrete wharf at Lampulo, this city’s main fishing port, Crispen Wilson wades through the crowd of men moving their catch on shore from high-prowed wooden boats. It is just after dawn as last night’s bounty hits the deck: mackerel almost as long as their barefoot captors, exotic reef fish splashed across wicker baskets, two giant swordfish, tuna of every stripe, and a small circle gathered around something big.

“Here we go,” Mr. Wilson says, squeezing into the group. In the middle is a dark tan ray, more than four feet wide from wingtip to wingtip, with giant hoods for eyes and a narrowing tail that curls outside the knot of men. It looks extraterrestrial.

While the fishermen look on, Wilson produces a pair of flat-nosed scissors, clips off a piece of tissue from the gill area, and drops the sliver into a vial of alcohol. Eventually, he’ll send it to a Canadian group creating a genetic tree of plants and animals around the world that could aid customs officers in identifying illegally trafficked material – including fish.

Joining these sorts of efforts comes naturally to Wilson, a Missouri native with a goatee and a penchant for T-shirts that say things like “Nigeria’s Endangered Primates” or “Conserve Madagascar’s Biodiversity.” As a conservationist, he’s worked with many of the world’s governments and largest green organizations to save endangered species and sensitive ecosystems.

But here in Lampulo, Wilson walks among the fishermen as a colleague. They know him because he spends his days working for the traditional local fisheries association, known as the Panglima Laut. In the wake of the Asian tsunami that tore through here four years ago this week, Wilson’s helped the Panglima build new digital navigation maps and databases of local fish with the idea of opening up export markets.

For locals, the efforts are the next stage of rebuilding – replenishing the collective knowledge of things like fish seasons
and shoals once handed down by word of mouth and then erased when tens of thousands of fishermen and traders perished among the nearly 170,000 Acehnese dead in the tsunami.

Wilson hopes his plucky grass-roots efforts will win the affections of fishermen so that one day he can ask leaders to aggressively manage their fishery and save this piece of the eastern Indian Ocean from the steep decline so common elsewhere in the world. "If you develop relationships," he says, "then at a later time when you come up with a good management plan, maybe the Panglima Laut will help implement it."

Some of Wilson’s old colleagues are praising his unusually deep dive from lofty global conventions into the hardscrabble, poverty-stricken world of Indonesian fishing, rife with illegal boats and heavy shark hunting that’s depleting the important predators. "Indonesia’s the No. 1 shark fishery in the world, and it’s going to be in serious trouble unless the [harvest] is taken care of," says Frazer McGilvray, with Conservation International in Washington, D.C. "Without locals buying in, no program is going to work."

On the ground, Wilson is learning to handle the sight of a fisherman dragging a rare species like that big ray by the eye sockets across the pavement and up onto a wall nearby. Turning away, he says in English unintelligible to the fishermen that he hates such scenes. Then he adds, "But even with a species you know is in trouble, how do you tell someone fishing it for five bucks a day that they can’t make five bucks a day?"

You don’t. At least that’s the deal he’s been sticking to since joining the Panglima Laut after meeting one of its key advisers, a young English-speaking boat owner named Ayee, at a net shop in 2007. Wilson had left a job at the US Geological Survey to join his wife, Emily Rand, an aid worker in Aceh. He’d already been exploring the local fishing industry by trading boxes of soda for trips to sea with Lampulo captains.

Some of the sun-leathered skippers complained the catches were getting worse. According to rough UN Food and Agriculture data, they are: In addition to the threat to sharks, other species, like tuna, are declining as well.

Wilson and Ayee set out to find what exactly the Acehnese were catching. They equipped some of the 250 boats in Lampulo with Global Positioning Systems that allowed captains to keep their nets off the bottom and quickly find fecund fishing grounds.

In exchange, Wilson downloads their daily routes, allowing him to develop digital maps and to pinpoint key fish habitats. Wilson and Ayee also cataloged the sales of hundreds of different fish species. That helped flesh out the portrait of local fish populations but was also crucial if the Acehnese wanted to, say, sell grouper to Malaysians across the Malaka Strait. Some species of grouper command a high price on foreign markets, but the Acehnese tend to lump all five species of the fish under one name.

Meanwhile, Wilson coaxed from fishermen information like the location of wild nurseries for young sharks and offered his own bits in return. He remembers a long argument in which he convinced a trader that bomb fishing – chucking dynamite onto a coral reef to stun fish – didn’t generate healthy regrowth of reefs.

“What we’re getting them to do is share the basics of resource management data,” says Richard Coutts, a consultant with the Asian Development Bank, which supports the Panglima projects through the Indonesian government.

But the trouble is the information may only carry the fishermen and their fleets so far. Centuries ago the chief Panglimas were powerful and independent Navy captains. But they have been reduced in stature by 50 years of independence, led by strongman Suharto, who consolidated authority in Jakarta and in national institutions. Decisions about managing fisheries now come from a branch of a national office. Just as important, policing power was long ago ceded to the national marine police and the Navy.

Today, foreign boats off Aceh prowl for fish with impunity, threatening both the livelihood of local fishermen and the conservation efforts of Wilson. Reports surface regularly of Thai fishermen in the area, who, according to wharf lore, paint their boats in the bright Acehnese colors, fly Indonesian flags, and have on occasion shot at Acehnese fishermen.

Ruslan, the newly elected head of the Lampulo Panglima Laut, who has a drawn face and has been fishing since age 11, says, “People ask me to go out and impound these boats. I’m scared! I’m not going out there. These guys have guns.”
Three months ago, Wilson was roaming the market when he found a fisherman carrying a buoy the size of a bike tire. He recognized it as a high-tech device that boats use to attract and haul in swarms of fish. A few weeks later another one appeared. Using a site run by the Indian Ocean Tuna Commission, Wilson tracked the first buoy to a trawler registered in the Seychelles, a collection of islands (and flag of convenience) off east Africa, and the second to a huge Spanish purse seiner.

These boats may have been playing by the rules and fishing in international waters, outside the 200-mile radius around Sumatra that belongs to Indonesia. But there’s also a chance they weren’t. “I’d like to see their logs,” Wilson says. Then, growing a bit incredulous, he adds, “A boat like that catches more in a day than all our guys combined. We’re talking about feeding 30 families on that boat versus 4,000 in Lampulo.”

The image of the Spanish boat, downloaded by Wilson onto his laptop, caused some worry around the Panglima office. Irawansah, a boat owner, took one look at the picture and gasped. “Our grandchildren will have no fish,” he said.

Then a few weeks ago, Wilson heard that foreign boats, supposedly Korean and Malaysian, were frequenting a biological rich seamount 70 miles off the coast. It’s an area he’s been intent on mapping and exploring with scuba gear. But when a high-ranking Indonesian official involved in Aceh’s reconstruction efforts suggested building a concrete island there and possibly manning it with marine police, Wilson says he was all for it.

“Compared to illegal fishing, the manned plateau would have less environmental impact,” he says.

And it would protect Acehnese interests. If at first he set out to bargain with them about limits on their livelihood, Wilson is now also out to protect them from intruders.

“I guess,” he allows, “I’ve gotten invested in a good compromise with fishermen in Aceh.”