

Farmers flee as world's deadliest volcano rumbles

Nasrullah Roa, Associated Press, 9-19-11

MOUNT TAMBORA, Indonesia (AP) — Bold farmers in Indonesia routinely ignore orders to evacuate the slopes of live volcanoes, but those living on Tambora took no chances when history's deadliest mountain rumbled ominously this month.

Villagers like Hasanuddin Sanusi have heard since they were young how the mountain they call home once blew apart in the largest eruption ever recorded — an 1815 event widely forgotten outside their region — killing 90,000 people and blackening skies on the other side of the globe.

So, the 45-year-old farmer didn't wait to hear what experts had to say when Mount Tambora started being rocked by a steady stream of quakes. He grabbed his wife and four young children, packed his belongings and raced down its quivering slopes.

"It was like a horror story, growing up," said Hasanuddin, who joined hundreds of others in refusing to return to their mountainside villages for several days despite assurances they were safe.

"A dragon sleeping inside the crater, that's what we thought. If we made him angry — were disrespectful to nature, say — he'd wake up spitting flames, destroying all of mankind."

The April 1815 eruption of Tambora left a crater 11 kilometers (7 miles) wide and 1 kilometer (half a mile) deep, spewing an estimated 400 million tons of sulfuric gases into the atmosphere and leading to "the year without summer" in the U.S. and Europe.

It was 10 times more powerful than Indonesia's much better-known Krakatoa blast of 1883 — history's second deadliest. But it doesn't share the same international renown, because the only way news spread across the oceans at the time was by slowboat, said Tambora researcher Indyo Pratomo.

In contrast, Krakatoa's eruption occurred just as the telegraph became popular, turning it into the first truly global news event.

The reluctance of Hasanuddin and others to return to villages less than 10 kilometers (6 miles) from Tambora's crater sounds like simple good sense. But it runs contrary to common practice in the sprawling nation of 240 million — home to more volcanoes than any other in the world.

Even as Merapi, Kelut and other famously active mountains shoot out towering pillars of hot ash, farmers cling to their fertile slopes, leaving only when soldiers load them into trucks at gunpoint. They return before it's safe to check on their livestock and crops.

Tambora is different.

People here are jittery because of the mountain's history — and they're not used to feeling the earth move so violently beneath their feet. Aside from a few minor bursts in steam in the 1960s, the mountain has been quiet for much of the last 200 years.

Gede Suantika of the government's Center for Volcanology said activity first picked up in April, with the volcanic quakes jumping from less than five a month to more than 200.

"It also started spewing ash and smoke into the air, sometimes as high as 1,400 meters (4,600 feet)," he said. "That's something I've never seen it do before."

Authorities raised the alert to the second-highest level two weeks ago, but said only villagers within 3 kilometers (2 miles) from the crater needed to evacuate.

That didn't stop hundreds of men, women and children living well outside the danger zone from packing their clothes, jewelry and important documents and heading to the homes of family and friends elsewhere on Sumbawa island.

"We've urged them to go back to harvest their crops, get their kids back in school, but we're having a hard time," said Syaifullah, a community chief in Pekat, at the foot of the 2,700 meter (8,900 foot) mountain.

"The new alert awakened fears about 1815."

Most people finally trickled back to their homes by Monday.

Little was known about Tambora's global impact until the 1980s, when Greenland ice core samples — which can be read much like tree rings — revealed an astonishing concentration of sulfur at the layer dating back to 1816, said geologist Jelle de Boer, co-author of "Volcanoes in Human History: The Far-Reaching Effects of Major Eruption."

Gases had combined with water vapor to form fine droplets of acid that remained for years in the atmosphere, circling the earth and reflecting some of the solar radiation back into space.

Temperatures worldwide plummeted, causing crops to fail and leading to massive starvation.

Farmers on the northeastern coast of the U.S. reported snow well into July.

In France, grape harvests were decimated. Daniel Lawton of the wine brokerage Tastet-Lawton said a note in his company's files remarks that 1816 was a "detestable year" and yielded only a quarter of the crop planted.

Soon after the ice core findings, scientists started studying Tambora in earnest.

In 2004, Icelandic volcanologist Haraldur Sigurdsson and a team of American and Indonesian researchers uncovered remnants of a village in a gully on Tambora's flank that had been pulverized in the fast-moving pyroclastic flow.

Sigurdsson heralded it as a "Pompeii of the East," and local researcher Made Geria says archaeologists have expanded the dig every year since then.

No one expects a repeat of 1815 just yet — it takes much more than 200 years for that type of huge pressure to build up again, said de Boer, who teaches at Wesleyan University in Connecticut.

But that's little consolation for those confronted with the mountain's new burst of activity.

Like Hasanuddin, teenager Malik Mahmud has heard the stories.

"Tens of thousands of people, animals and rice fields disappeared," the 15-year-old said, adding that a veil of ash blocked out the sun for years.

"There was no life here," he said quietly from the village of Doropeti, 15 kilometers (nine miles) from the crater. "I know that from my parents."