

# Great earthquake reduced NZ towns to piles of rubble

It was unbearably hot on the morning of February 3, 1931. The heat had thinned the air and some of the elderly residents of Napier on the east coast of New Zealand's North Island found breathing difficult.

It was holiday time and the beach and the tree-lined Marine Parade facing Hawke Bay were crowded with people, mostly tourists who supplemented the town's normal population of 16,000.

In the bay part of the crew of the sloop HMS Veronica was preparing for shore leave. Nearby the cargo vessels Northumberland and the Taranaki pitched markedly as a 2m swell swept their lengths.

In fact there was something unusual about that swell. It was particularly heavy for that time of the year and had been sweeping the bay for days.

Hawke Bay's seabed exploded in a geological frenzy at precisely 10.47am on that catastrophic Tuesday in 1931.

In an instant a massive submarine convulsion heaved the bay and part of the town of Napier high. At the same moment a mighty wind roared in from the ocean.

That was the first shock. For three minutes others followed as enormous pressures, trapped under the earth's crust for eons, burst out to freedom.

In those few minutes Napier was devastated and a pall of terror and destruction descended over the countryside for kilometres around.

In Napier collapsing buildings, flying debris and great fires that raged through the ruins brought death to 161 in the worst natural disaster in New Zealand's history.

The death toll in nearby Hastings totalled 90 while five more perished in Wairoa. In addition 1500 were seriously injured.

## POWERFUL

So powerful was the earthquake that almost 160km of coastline changed its conformation when cliffs collapsed and submerged reefs were thrust above the surface of Hawke Bay.

Earthquakes were not new to residents of the North Island's east coast. Previous tremors had occurred in 1890, 1904 and 1921 but they had been comparatively minor and casualties and damage were light.

The visitation of Tuesday, February 3, 1931, was different. That mighty convulsion lifted the ocean floor and part of the city of Napier with it.

It also sent shock waves fanning out up and down the coast and deep inland, killing and destroying as it advanced.

Like earlier geological disturbances, the earthquake of 1931 came without warning. The two phenomena occurred simultaneously: as a hurricane-force wind blasted in over Napier, the seabed heaved violently.

Then, suddenly, the wind dropped and the earth's crust, as though exhausted by its dynamic exertions, res-

## HISTORICAL FEATURE

ted. The respite lasted but seconds. Then the madness began again.

During the next 180 seconds the earth rocked, yawed and pitched while deafening claps of thunder split the air. That was when most people died and the entire district was ripped apart.

From the waterfront in

But there were problems. The bay was shallowing rapidly. The Veronica, her mooring hawsers broken when she lifted, ran aground, listed but then came free when a heavy swell hit her.

Because Napier's communication systems had been put out of action by the initial shock, it was the Veronica's



When this picture was taken a pall of smoke and dust still hung high over the ruins of Napier, chief victim of the earthquake of February 3, 1931.

Napier back through Hastings, Dickens, Emerson and Tennyson Streets to Clive Square buildings collapsed in huge piles of dust-shrouded rubble.

In one street a wall of one three-storey building bulged and then, with a roar, came crashing down on fleeing shoppers. Another wall reduced a bus to half its height.

It took only seconds but in that time streets became impassable, choked with crushed cars, fallen poles and rubble that was once buildings.

Over it all scrambled hundreds of fear-stricken people heading for the waterfront.

Soaring above the cacophony of mass panic came the screams of the injured trapped under piles of masonry.

Then the broken gas mains ignited. Soon great clouds of smoke were mingling with the pall of dust as flames began chewing their way into the wreckage.

Firemen could do practically nothing as the fire leapt from one building to another because water supply systems had been fractured and, anyway, most of their vehicles had been crushed when fire stations caved in.

In the bay the crew of HMS Veronica felt their ship heave as the rising ocean floor lifted vast masses of water with it. Capt Morgan's immediate reaction was to get his command to sea.

radio that sent to the outside world the first news of the disaster.

It was when Capt Morgan looked shorewards and took in the horrifying sight of a destroyed and burning city that he realised his first duty was, not to get his ship to sea, but to take aid ashore.

When the first boatload of sailors reached land they immediately joined police, firemen and volunteers who were trying to dig the dead

and dying from the ruins of Napier.

These rescue teams came across scenes of unparalleled anguish. At St John's Anglican cathedral, for instance, a communion service was being held when the first shock hit.

## INJURED

As the walls began moving the worshippers headed for the various exits. Most made it but scores were still in the cathedral when hundreds of tonnes of masonry crashed on them.

The injured were still being dragged from the rubble when flames were seen sweeping towards the cathedral.

When it became obvious

that one woman could not be pulled from beneath a beam a doctor, to save her from death by fire, gave her a massive morphine injection.

It was just as terrible at the Napier Technical College, a building that was shaken to pieces as the students tried to flee from it. Later 20 bodies were unearthed from the ruins.

Behind the town an entire wing of the Napier hospital collapsed killing 10 patients and staff. A nurses' home that had been built recently fell into a dust-shrouded mass when the walls opened up from top to bottom.

There were about 30 night duty nurses asleep in the quarters when the earthquake hit Napier. Of these eight died while 16 others, all previously injured, were later dug from the wreckage.



Sailors from a NZ cruiser carry a body from a wrecked Napier building. The earthquake's final death toll in the town was 90.

to the top of Bluff Hill despite the fact that already a large section of the hill had broken away and slid down to the waterfront.

From Bluff Hill Hawke Bay presented a nightmarish sight with large parts of the seabed standing as much as 2m above water level.

A long chain of rocks were now revealed where previously there had been only water. A few kilometres away at Port Ahuriri what had been an inlet from the bay was now dry land. And not a single harbor installation remained.

During the night of February 3-4, rescue parties worked by the light of the leaping flames digging out the injured and searching for the bodies of the dead.

The Botanical Gardens and Greenmeadows Racecourse were used as casualty clearing stations and, as the hours wore on, the number of burned, crushed and mutilated victims passing through these centres increased.

It didn't take long for the limited supply of drugs to run out. There were no anaesthetics and doctors had to carry out amputations without their use.

One former World War I medico said: "It is the horror of the battlefield over again."

By dawn on February 4, 75 bodies had been recovered and more than 500 injured treated at the clearing stations. And exhausted rescue teams had no idea how many more remained entombed.

But already radio flashes sent from HMS Veronica had been received and massive rescue operations were being organised.

the end the Government, afraid of a disease outbreak, ordered the evacuation of all civilians not members of rescue teams.

And the rescue teams still had much work to do for hourly these men continued dragging from the still-smouldering wreckage the bodies of more victims of the Napier catastrophe.

Immediately after being laid out the corpses were doused with formalin and carried on sheets of corrugated iron to a temporary morgue for possible identification.

The count of dead had risen to 161 when authorities decided their work was done. Only then did the task of levelling the debris and laying the foundations of the new town of Napier begin.

## HORRIFIC

Though Napier suffered the worst blow when the earthquake hit it was not the only centre touched by death and destruction on that horrific February day.

At Hastings, 40km inland, 90 died in a series of short sharp shocks that destroyed a large section of the business-shopping centre.

Twelve female shop assistants were found dead in the ruins of a large department store from which customers and the rest of the staff managed to flee shortly before the 'quake shook it to pieces.

The public library was another building that didn't survive the shock and nor did all those in it.

Rescuers worked in a frenzy for a while but then gave up when it became obvious no one could possibly have survived.

Wairoa, at Hawke Bay's northern extremity, lost five dead. There were no casualties in Gisborne and Wairoa but damage was severe.

Not until the middle of March, with electricity and water services back in operation, was it possible for Napier to begin to live again amid the wreckage of the great earthquake.

And then demolition went on for months before a new town began to rise on the graveyard of the old.

## Napier and the 1931 shocks

After steaming from Auckland at full speed two cruisers, HMNZS Dunedin and HMNZS Diomedea, reached Napier early on February 4. Aboard them the ships carried doctors, nurses, ambulances and medical supplies.

Soon vehicles loaded to the springs with tents, blankets, clothing and food were moving cautiously over inland roads damaged by landslides. Weakened bridges were also a hazard.

Napier burned for two more days. The beach and parks became shanty towns where 2000 people lived in tents or shelters constructed from earthquake debris.

Already the authorities were aware of the dangers associated with the shattered sewerage system. In

Hundreds of others fled to town parks while still more, fearing a tidal wave, made it