CLEW Newsletter

Flood Sub-Limits: Who decides how much is enough?

One of the more difficult perils for a commercial property underwriter is flood, but until I became an expert witness, I didn't realize it was even more difficult for the insured.

First, a bit of history. I started my career in insurance in 1977 as a loss control engineer for an HPR property insurer. The company was starting to write flood. After inspecting the property, I worked with the office engineers and underwriters to locate the facility on a paper flood map. Flood maps showed the flood risk according to zones; low, medium, and high. The process was the same when I started in underwriting a few years later. Back then (OK Boomer) a $500,000 flood limit was a princely sum. A $1 million limit required committee review. The lower the flood hazard zone, the higher the limit available.

Fast forward to 2020. Now flood zones are available through on-line or third-party resources. Topographical information is available, and individual location flood scoring is becoming more common. However, the basic approach to offering flood coverage hasn't changed. Underwriters offer flood coverage with sub-limits per zone based on their underwriting guidelines. They do this to limit their exposure to a large catastrophe loss. Unlike a fire, a large flood can damage many locations. Also, the fire limit is usually the total of the property damage and business income values, but the flood sub-limit has little or no correlation to the exposed values.

I can safely say that this is the market practice. As a property underwriting auditor, I have audited large and small commercial property insurers. Although the size of the offered sub-limit varies by company, they take the same approach; lower hazard zones get a higher sub-limit and vice versa. It has been the market practice for so long that I assumed everyone knew how it worked, but I found out differently.

The case involved an insured who had a small flood sub-limit on their policy. A large weather event occurred, and the location was flooded. The damage was well above the flood sub-limit. In the suit the insured alleged that the insurance company had inspected the location several times over the years and issued reports with recommendations to correct deficiencies. They should have told the insured that the flood sub-limit was too low. Of course, it is always the insured's responsibility to decide on size of their limits and sub-limits. What struck me was the insured's belief that the flood sub-limit was based on the insurance company's evaluation of the exposure and not a figure from their underwriting guidelines.

In the second case a commercial property policy was issued with the usual flood sub-limits by zone. The policy renewed unchanged several times. A weather event caused a flood at one of the locations. The location was in a high hazard zone and subject to a small sub-limit. Upon investigation, it was determined that at the time the original policy was issued the location was in a low hazard zone (with a higher sub-limit) but the flood maps were redrawn for that area, and the location was now in a high hazard zone. The insured alleged that the insurance company should have told them about the remapping and zone change. Of course, insurance companies don't keep track of map changes. In fact, one of the advantages of "sub-limits by zone" is that it is maintenance free. Again, I was surprised that the insured expected the insurance company to manage their flood exposure.

Knowing that an insurance company offers flood sub-limits based on their underwriting guidelines, how can an insured determine if the offered limit is adequate? Here are some actions they can take:

- Know the flood zones of the locations. These can be obtained on-line or through third-party vendors. Check them on every renewal.
- Check the flood sub-limits per zone against the PD and BI values of the locations in those zones. If the total values are greater than the sub-limit, ask the insurance company to increase the sub-limit (possibly with facultative reinsurance) or buy excess flood from a specialty market.
- It is always wise to perform a loss expectancy (LE) calculation. Although this sounds daunting, the insured is in the best position to make an estimate. If there were three feet of water in the building for two days, what would get damaged? How much would it cost to repair? How long would business be shut down? The advantage to an LE analysis is that it can stimulate action on loss mitigation and emergency planning. Take your best guess and increase it by a good margin for contingencies.
- This next one is more complex. Remember that the flood sub-limit is per occurrence, but a large flood event can cause damage to multiple locations over a wide geography. The sub-limit applies to the entire loss over all locations (not per location). For large schedules consider working with a flood modeling vendor that can perform a probabilistic flood analysis.
- Finally, I recommend scheduling the locations on the policy by flood zone. This ensures that the insured and insurance company agree on which locations are in which zones. It also gives a hedge against map changes.

In summary, flood sub-limits are a way of protecting the insurance company against catastrophic events. They are not based on the insured’s exposure. The insured must apply some risk management practices to understand the risk and purchase limits they believe are adequate.