



WHITE PAPER

PROPERTY & CASUALTY

Property Insurance & Captives: Thinking Like an Underwriter

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Property Insurance & Captives: Thinking Like an Underwriter

A property captive transforms risk managers into underwriters. Rather than transferring risk to the commercial market, the organization retains a defined layer of property risk and funds it with its own capital.

Success depends on effective loss prevention, strong exposure data, and a realistic assessment of how much risk the organization can absorb. Because the organization bears the financial consequences of its decisions, a property captive creates accountability and shifts the focus from buying insurance to underwriting risk.

Before addressing retentions, capital, or reinsurance, the first question is whether the organization truly understands and controls the exposures it plans to retain.

Risk Control Comes First

Before addressing the financial structure, the risk manager should assess the organization's efforts to reduce the frequency and severity of property losses and identify any gaps. In a fully transferred program, risk improvement recommendations from the carrier's engineers are compiled in a binder and may or may not be funded. In a captive, every unaddressed hazard is a cost the organization chooses to bear. That shift in incentive is the single most important reason captives work for property.

Risk control is the foundation of the captive conversation.

Some areas to consider include the following.

Physical protection and fire prevention. Review sprinkler systems, fire detection and suppression, compartmentalization, electrical maintenance, and hot work permitting. These are the basics that underwriters price to. A site with full sprinkler protection and redundant fire detection is a fundamentally different risk than one without. In a captive, that difference flows directly to the organization's own loss fund rather than subsidizing a carrier's book.

Equipment reliability and maintenance. Boiler and machinery failures, electrical faults, and equipment breakdowns are frequency drivers. Preventive maintenance programs, infrared scanning of electrical panels, and vibration monitoring on critical equipment all reduce that frequency. Underwriters look at maintenance culture as a leading indicator of loss potential.

Water damage prevention. Water damage is one of the most common and preventable drivers of property loss, yet it is chronically under-addressed. Roof condition, plumbing age, freeze protection, and water detection systems all matter. A captive with a portfolio of older buildings and no water-damage prevention program is funding a predictable loss stream with its own capital.

Natural hazard mitigation. For catastrophe-exposed locations, consider roof tie-downs in wind zones, flood barriers, and seismic bracing. Mitigation does not eliminate the peril, but it meaningfully changes the severity distribution, which has direct implications for how much retention the organization can absorb.

Business continuity planning. Time-element losses such as business interruption (BI), contingent BI, and supply chain disruption can dwarf direct property damage. If the organization's top revenue-producing facility goes down for six months, what is the financial impact, and what is the recovery plan? Many organizations cannot answer that question with any precision. The captive makes the cost of that uncertainty visible.

The captive's financial performance over a five- to ten-year horizon is a direct function of how well the organization manages the hazards it retains. For meaningful conversations to take place, risk managers must be armed with quality data.

The Information Behind the Risk

Underwriters make decisions based on data. For property in a captive, the quality of that data is imperative. The core datasets that drive underwriting decisions and captive program design include the following.

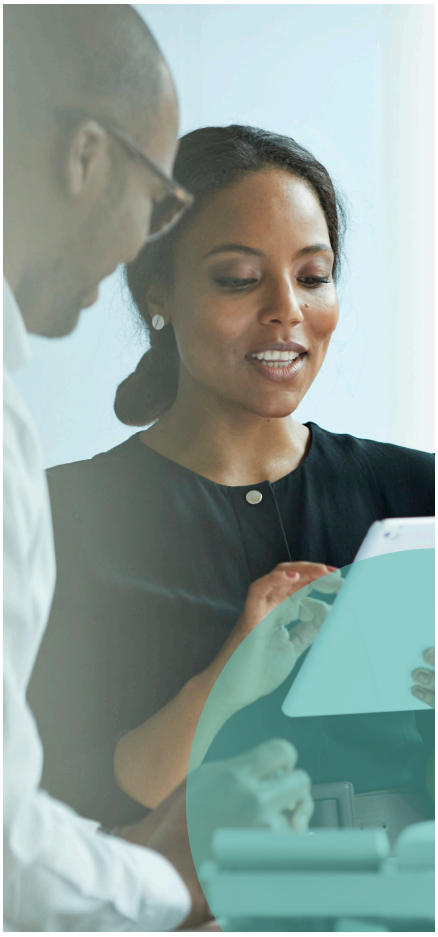
Statement of values (SOV). The SOV is the backbone of the risk management program and must reflect actual replacement costs. Understated values leave the captive underfunded, and the reinsurance tower may not respond where the organization needs it. Overstated values mean the organization is overcapitalizing retained layers and overpaying for transfer. Bad data in either direction produces a structure that does not match reality.

COPE data. Construction, occupancy, protection, and exposure (COPE) data are what underwriters use to differentiate risk quality across a portfolio. A captive that cannot produce credible COPE data for its top locations is asking its reinsurers to price blindly, and they will price accordingly.

Loss history. At least five years of loss history is required, although ten years is preferred. The data should include ground-up loss detail by cause of loss and by location, with attritional losses distinguished from severity-driven events. The loss history reveals what the actual retention experience looks like and whether it is stable enough to fund predictably.

Catastrophe (CAT) modeling. For any portfolio with meaningful wind, earthquake, flood, or convective storm exposure, modeled output (average annual losses [AALs], occurrence exceedance probabilities [OEPs], and probable maximum losses [PMLs] at various return periods) is essential for sizing retentions and buying reinsurance. But model output is only as good as the input. Secondary modifiers, data defaults, and model assumptions can swing results materially. A good underwriter stress-tests the model rather than simply running it and accepting the number.

Loss expectancies. Beyond historical loss data and CAT models, a captive property program should develop scenario-driven loss estimates for key locations and perils, similar to the normal loss expectancy (NLE) and PML analyses that underwriters develop when pricing a risk. These estimates should reflect actual conditions on the ground, including existing fire protection, building construction, occupancy hazards, exposures from neighboring properties, and the reliability of public and private fire response. They should be updated periodically as those underlying risk elements change. A new tenant, a deferred sprinkler repair, a shift in occupancy, or a change in fire department response capability all affect the loss expectancy. Organizations that maintain current loss expectancies across their portfolio have a clearer picture of what they are retaining and can make better decisions about where to invest in risk improvement.



Bad data produces a risk management structure that does not match reality.



Business interruption exposure. BI deserves its own analysis. What is the maximum period of indemnity? What are the interdependencies between sites? What contingent exposures exist through key suppliers or customers? BI values are routinely understated because organizations do not perform the forensic work of tracing revenue dependencies across their operations.

Where Risk Financing Meets Underwriting

When deciding whether to retain or transfer risk, the risk manager must think like both a financial officer and an underwriter. The question is how much volatility the organization can absorb and at what point the cost of retention exceeds the cost of transfer.

Most captive property programs layer in three tiers:

1. operating-unit deductibles at the bottom, creating local accountability;
2. the captive retaining a working layer above that, absorbing predictable and moderate losses; and
3. commercial reinsurance or excess coverage above the captive's retention, protecting against severity and catastrophe.

Property captives succeed or fail long before a claim occurs.

The attachment points between these layers are the critical design decisions. They should be driven by loss modeling and financial analysis, not round numbers. Consider the following.

Frequency losses: retain. These are small, predictable, recurring losses, such as minor water damage, equipment damage, and localized fire losses. Commercial carriers price these with the most margin because claim processing is expensive relative to loss size. They are also the losses an organization can forecast with reasonable confidence. Retaining them is the starting point for most captive property programs.

Severity losses: the judgment zone. This category includes things such as a single large fire, a major equipment failure, or a significant BI event. Can the captive absorb a bad year, or two bad years back to back, without destabilizing? That depends on the captive's surplus, the parent's balance sheet strength, and leadership's tolerance for earnings volatility. Consider this useful benchmark: if a single loss would consume more than a defined percentage of annual captive premium or surplus, it probably belongs in a transferred layer.

CAT losses: transfer. These include earthquakes, named windstorms, and floods. They are low-frequency, high-severity, and geographically correlated. These perils can overwhelm a captive in a single event, and reinsurance exists to absorb the resulting losses. The captive's role in CAT-exposed portfolios is typically to retain a working layer below the CAT attachment and transfer peak severity upward.

Capital adequacy. The captive domicile will have its own capitalization standards, but those are minimum thresholds. The real question is whether the captive has enough surplus to sustain its retention strategy through a realistic adverse scenario. A feasibility study should stress-test three- to five-year loss projections under multiple scenarios, including a year with both elevated frequency and a severity event.

Characteristics of High-Performing Property Captives

How can you distinguish a well-run captive property program from a poorly run program? Here are the markers.

Engineering-driven premium allocation. Premium charges to business units reflect actual exposure quality, loss experience, and the completion of risk improvement recommendations, rather than standard benchmarks such as revenue or square footage. This creates a direct financial signal to operations and turns the captive into a governance tool.

Active loss control governance. The captive board or its risk committee reviews engineering reports, tracks recommendation completion rates, and ties capital allocation decisions to risk quality. The organization is underwriting its own risk, and that changes behavior at every level.

Data discipline. SOVs are updated annually with defensible replacement cost valuations. COPE data is maintained at the site level. Loss data is granular and coded for cause-of-loss analysis. CAT model runs are refreshed when the portfolio changes.

Transparent retention philosophy. The organization can articulate why it retains what it retains because the losses are within forecasting confidence, the controls are adequate, and the capital supports it.

Reinsurer relationships. The captive's reinsurers view it as a well-managed risk. That perception is earned through data quality, loss control investment, and consistent communication, and it translates directly into better terms over time.

Property captives succeed or fail long before a claim occurs. Their long-term performance depends less on how losses are financed than on how well the underlying risks are managed.