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Private Debt: Qualitative Overlays in Credit Risk Models: Practices, Emerging Trends, and Use of AI

Overview

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Private credit originators are often required to employ qualitative overlays (also called post-model adjustments or overrides) to adjust credit risk model outputs when models alone cannot fully capture certain risks. These overlays are judgmental adjustments applied on top of quantitative model results – for example, increasing expected loss estimates or modifying risk ratings – to account for limitations like scarce data, model deficiencies, or new risk factors. Such overlays became especially prominent during unprecedented events (e.g. the COVID-19 pandemic), and remain an integral tool for addressing emerging risks that lack historical data.

When used with robust analysis and governance, investors should welcome overlays as a way to ensure credit risk is measured prudently. However, excessive reliance on judgmental overlays can mask model weaknesses, so non-banking institutions have the pressure to govern overlays carefully and ultimately improve their models. This report examines guidance on overlays and industry practices among non-bank private debt originators. Particular focus is given to the potential **use of generative AI for overlay governance**. We provide examples of overlays for emerging risks like trade tariffs, technological disruption, and climate change.

Credit Risk Assessment by Non-Bank Lenders (Private Credit)

Outside the traditional banking sector, non-bank lenders – such as private debt funds, direct lending platforms, consumer finance companies, and peer-to-peer lenders – also conduct credit risk assessments, but their approach to qualitative overrides can differ due to less regulatory constraint and often different business models. These lenders do not necessarily follow IFRS 9 or Basel capital rules (though many will still provision for expected losses in some form), so the term *qualitative overlay* might not be formally used. Nonetheless, the concept of **expert adjustments** in credit risk is equally relevant.

Private debt funds typically make loans to middle-market or large corporate borrowers, sometimes in niche or higher-risk areas. Their credit assessments are often more deal-specific and qualitative to begin with. These lenders might use internal credit scoring models or rating tools as a baseline, but given the bespoke nature of private loans (each loan has unique covenants, collateral, and borrower dynamics), fund managers place heavy weight on qualitative analysis – essentially building in overlays from the start. For example, a private credit fund may use a financial model to predict a company's default probability, but the credit committee will then overlay considerations like the **sponsor's support**, the **competitive position of the company**, or **upcoming technological changes in the industry**. If a quantitative risk model outputs a certain rating, the committee might override it (up or down) based on these soft factors. This is analogous to banks' rating overrides, though in private credit it's often not seen as an overlay but rather an integral part of the credit decision process.

When it comes to portfolio risk management and provisioning, some larger non-bank lenders that report under IFRS or US GAAP do apply expected loss methodologies similar to banks. They likely incorporate qualitative adjustments as well. For instance, a consumer finance fintech that underwrites personal loans online will have credit score models driving initial loss estimates, but it may add a management adjustment if it notices a macroeconomic trend (like rising unemployment in a region) that isn't yet in the data. Unlike banks, these firms might not publish the details, but the overlay could take the form of increasing their loss reserve beyond what the pure model suggests. Consumer finance providers (like payday lenders, installment lenders, or buy now pay later firms) often operate in segments with limited data (new customer profiles, thin credit files). They might set aside extra reserves or tighten lending criteria based on qualitative expert calls – for example, pulling back credit in certain geographies due to an observed increase in delinquencies that the scorecard hasn't caught up with. These actions are effectively qualitative overrides in underwriting or provisioning.

Non-bank vs Bank governance: Non-bank lenders are not subject to the same level of regulatory oversight on model risk. This gives them flexibility, but also means practices can be inconsistent. A private credit manager might decide on an overlay purely in an investment committee discussion, without the formal documentation a bank would require. However, sophisticated players do have internal risk frameworks. Many will perform **stress tests and scenario analysis** on their portfolios. If a scenario (say, a sharp interest rate rise) indicates vulnerabilities not reflected in current risk metrics, the manager might increase credit spreads or reserves accordingly. Rating agencies, when assessing these private credit portfolios (for example in structured products or fund ratings), also look at qualitative overlays. Fitch Ratings notes that in analyzing certain private credit CLOs or funds, they include a *qualitative overlay* on top of quantitative analysis to account for factors like **portfolio management quality** and **illiquidity**. This mirrors how the lenders themselves blend quantitative and qualitative factors.

Another aspect is that private credit often involves more one-to-one negotiations. **Covenants and triggers** can act as a form of risk mitigation that quantitative models don't fully capture. A private lender might be more hands-on with a borrower in trouble (since they often have control rights or board

observation). This active management is a qualitative element that might reduce loss severity. Conversely, if a private lender senses a particular industry (say, retail or energy) is becoming riskier due to external factors, they might require extra collateral or shorten loan tenor – effectively overlaying caution into the deal structure rather than just a model output.

In summary, non-bank lenders use qualitative judgment extensively in credit risk assessment, effectively making overrides part of their standard process. They might not label them overlays as banks do for IFRS 9, but in practice, a private debt fund manager adjusting expected losses or required yields based on subjective risk views is doing something very similar. The difference is often one of scale and disclosure: banks systematically apply and report overlays, whereas private lenders do it more informally and internally. As private credit markets grow and face their own credit cycle, we can expect these lenders to increasingly formalise their risk assessment, possibly adopting more data-driven models – but given the bespoke nature of deals, qualitative overrides will remain a key tool. Notably, some fintech lenders are exploring AI models, but even these often require human overrides to catch things the AI might miss (like an impending regulatory ban on a certain high-cost loan product).

Non-banks might not be forced by regulators to quantify things like climate risk or macro scenarios, but from a best practice standpoint, many will still consider those factors. For example, a private real estate debt fund will be aware of climate-related risks (**flood zones, energy efficiency standards**) and might qualitatively adjust their internal risk ratings or required returns for loans with higher climate exposure, even without a formal overlay framework. In effect, private credit risk assessment is often a combination of quantitative score plus qualitative overlay performed intuitively by experienced credit professionals.

Generative AI for Overlay Identification and Governance

The advent of generative AI and large language models presents new opportunities to enhance the way banks and non-bank institutions identify, implement, and govern qualitative overlays. Given that overlays are meant to capture complex, forward-looking risks and require careful documentation, generative AI can be a powerful assistant in making these processes more repeatable, auditable, and consistent:

- **Identifying Emerging Risks:** Generative AI models can rapidly digest vast amounts of unstructured data – news reports, industry research, earnings call transcripts, social media – to flag potential risk factors that humans might not easily compile. For example, an AI system could be set to monitor global news for mentions of trade policy changes, new tariffs, geopolitical tensions, technological breakthroughs, or climate events. By parsing this data, the AI could identify patterns or specific concerns (say, an unusual cluster of news about crop failures and food price spikes, indicating emerging stress in agricultural loans). It could then suggest to risk managers that an overlay might be needed for that risk. Essentially, **AI can serve as an early-warning system**, surfacing qualitative signals of risk that aren't yet in the numbers. Some lenders are already exploring AI for risk trend analysis – for instance, using natural language

processing to gauge sentiment about certain industries or to extract risk drivers from economic reports. Generative AI can summarise these findings in plain language for risk committees, helping them decide if a qualitative overlay (and of what magnitude) is warranted.

- **Supporting Implementation and Quantification:** Once a risk gap is identified, implementing an overlay involves quantifying the potential impact. Generative AI can aid here by generating **scenario narratives and data estimates**. For example, if an originator wants to overlay for AI-induced job disruption risk (suppose the originator is worried that AI could displace workers in call centers, affecting consumer loan defaults), an AI tool could help gather relevant data (how many borrowers work in at-risk jobs, what are the unemployment projections in that segment) and even simulate scenarios. While AI models are not a substitute for quantitative models, they can assist analysts in constructing a reasoned estimate. They might draw on historical analogies (e.g. past waves of automation) or combine multiple information sources quickly. Moreover, generative AI could produce alternative scenarios: *“If AI adoption accelerates, default rates for segment X could double – yielding a EUR Y increase in expected loss.”* These outputs can help human experts fine-tune the overlay amount. Essentially, AI can augment the expert’s ability to synthesise information and could reduce the subjectivity by ensuring a broader evidence base is considered.
- **Consistency and Documentation:** One of the challenges with qualitative overlays is ensuring they are applied consistently across the organization and well-documented for audit and regulatory review. Generative AI can be deployed to create standardised documentation each time an overlay is created or revised. For instance, after a risk team decides on an overlay, an AI assistant could generate a draft overlay rationale memo: explaining the risk driver, how it’s not covered by the model, data used for the overlay, and the governance process followed. This would save analysts time and ensure that all required elements (per policy or regulator expectations) are documented. The AI can be trained on past overlay memos and regulatory guidelines so that it produces text that ticks all the boxes (justifications, impact analysis, planned review date, etc.). This improves auditability – every overlay has a clear narrative that is consistent in style and content. It also ensures repeatability: the next time a similar overlay is needed, the AI can reference previous cases to maintain continuity in approach. Lenders could maintain an “overlay repository” that the AI learns from, preserving institutional knowledge even if personnel change.
- **Governance and Control:** Generative AI can also act as a checker. It can compare the overlays applied across different portfolios to ensure there are no contradictions or double-counting. For example, if one committee applies a macroeconomic overlay that already partly covers a risk factor, and another committee is proposing a separate overlay for a sub-portfolio for the same risk, the AI can flag potential overlap. It can also ensure that when an overlay is removed, any dependent documentation is updated. Additionally, AI can facilitate what-if analyses: management might ask, “What if we did not apply this overlay? What would our provision be?”

The AI could swiftly compile the answer by removing the overlay assumptions. Or vice versa: “If the risk worsens, how would we scale the overlay?” - the AI could help project that.

- **Audit Trail and Repeatability:** Using AI to generate and store overlay rationales creates a clear audit trail. Each generative output can be saved, and the prompts that led to it can be archived. This means that months or years later, the lender can trace how an overlay decision was made, what information was considered, and even replay the AI analysis if needed. Consistency is improved because the AI approach reduces random human bias. For instance, one risk manager might write a very detailed justification while another writes a sparse one – an AI can normalise this by always producing a comprehensive first draft. It also can ensure language consistency, which is helpful when regulators review multiple lenders – if many lenders use AI to guide overlays, they might converge on best-practice language and criteria.
- **Innovation in Scenario Generation:** Generative models can create plausible forward-looking scenarios that traditional statistical models might not, by blending various narrative elements. For example, an AI might generate a scenario combining a trade war with a cyber attack – something not easily modeled purely statistically. While speculative, such scenario generation can help risk managers think outside the box and consider overlays for compound risks. It is crucial, however, that human experts validate these AI-generated scenarios; generative AI might produce noisy or unrealistic outcomes, so **human-in-the-loop governance** is essential.
- **AI Challenges:** It's worth noting that while generative AI can support overlays, it is not a magic bullet. AI models might not have up-to-date information past their training cutoff, so integrating them with real-time data feeds is necessary. They also could reflect biases from their training data. For instance, if an AI was trained on past risk reports that underemphasised climate risk, it might not highlight climate as much – hence, careful calibration and feedback to the AI system is needed. Additionally, regulators will want transparency on AI contributions. If an AI suggested an overlay, the lender should document that rationale just like any other input, to maintain auditability. Over time, as generative AI suggestions prove useful, they might become trusted inputs, but initially lenders will treat them as advisory.

In conclusion, generative AI can significantly enhance the overlay management process by scanning for emerging risks, aiding in quantification, ensuring consistent documentation, and maintaining an audit trail. It effectively acts as a force-multiplier for risk teams, allowing them to cover more ground and justify overlays more robustly. The outcome is a more repeatable process – each overlay goes through a similar AI-augmented workflow – and a more consistent approach – reducing person-to-person variation in how overlays are handled. The combination of human judgment and AI analytical breadth could lead to better informed, timely overlays that stand up to supervisory scrutiny. Private debt funds and non-bank lenders are only beginning to experiment here, but the potential is large, especially as investors and regulators themselves are interested in using AI to detect risks. For specific AI use cases in the context of **loan trading, valuation, transaction due diligence, legal process data extraction and**

standardisation, credit report generation, market comparables and others see accuria.com/insights.

Capturing New and Emerging Risk Factors with Overlays

By design, qualitative overlays are often used to capture new or emerging risk factors that are not yet reflected in historical loss data. In recent years, banks and non-bank lenders have identified several such risk themes and increasingly use overlays to incorporate them into credit risk measures. Modern credit portfolio management systems will support the tracking and backtesting of qualitative overlays. Some of the prominent emerging risk factors now commonly addressed via overlays include:

Segment: Portfolio remainder

Assigned assumptions: Trade and AI Employment Shock

Edit the selected assumptions

Select different assumptions

Name	Description	Last Updated	Source	Actions	Status
trade	All	All	All	All	All
US Trade War Moderation		2025-05-07 06:58:45	NPL Markets	Select	Private
US Trade War Escalation		2025-05-07 06:59:36	NPL Markets	Select	Private
Trade and Inflation Shock May 25		2025-05-07 07:00:27	NPL Markets	Select	Private
Trade and AI Employment Shock		2025-05-07 07:02:57	NPL Markets	Select	Private

Showing 1 to 4 of 4 entries (filtered from 59 total entries)

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Figure 3: Management platform for qualitative overlays for consistent record keeping and back testing of new risks like trade disruptions or AI induced unemployment shocks. Source: accuria.com

- Trade Wars and Tariffs:** Geopolitical trade tensions can materially affect borrowers, especially exporters and globally integrated firms. A prime example was the U.S.-China trade war (2018-2019) where sudden imposition of tariffs disrupted supply chains and increased costs. European and Asian banks had to account for how their borrowers exposed to international trade might suffer then and are currently repeating the exercise for the newly inflamed trade war in April 2025. Nowadays, any significant trade policy change often leads lenders to consider a **geopolitical overlay**. This might entail grouping affected borrowers (by sector or region) and

applying an additional loss cushion for them. Overlays for trade war risk became common practice because the data about default impact will only emerge with a lag, but lenders need to be proactive. For example, a lender might simulate the impact of the proposed 25% tariff on auto parts: if their model doesn't account for that, they overlay by increasing PDs for auto parts manufacturers by a certain factor (Figure 1).

- **Supply Chain Disruptions:** Related to trade, but even broader are supply chain issues (like the semiconductor shortages, or shipping bottlenecks). The ECB (2023) found that banks often overlay for supply chains in general as one of five novel risk categories. When key inputs or logistics are disrupted, certain borrowers might face distress that isn't captured by lagging financial statements. Overlays for this can be transient (applied during the disruption period) and are often sector-specific (e.g. an overlay on the wholesale trade sector during a port closure).
- **Inflation Surges:** High inflation, especially when unexpected, is a risk factor many models (calibrated in low-inflation times) understate. Banks have started overlaying to account for inflation's effect on borrowers' ability to repay. This was evident in 2022-2023 as inflation spiked globally. Overlays targeted at cost of living (for retail) or input cost inflation (for corporates) became widespread. Inflation also ties into interest rate risk – the combination often captured under a macroeconomic overlay. While models might use baseline and adverse scenarios, many banks felt those scenarios did not fully capture the non-linear effect of very high inflation on default rates, prompting judgmental top-ups.
- **Technological Disruption (AI and Automation):** Rapid technological change, particularly advances in artificial intelligence and automation, can render certain business models or jobs obsolete, affecting creditworthiness. This is a relatively new category for overlays. For example, if a lender is exposed to a lot of auto manufacturing suppliers, the shift to electric vehicles (and automation in factories) might pose a risk if those suppliers don't adapt – an overlay could be applied to increase provisions for auto-sector loans in anticipation of this technology-driven disruption. Specifically, AI-induced job disruption on the consumer side is a forward-looking risk: if AI were to replace, say, many roles in customer service or coding, a segment of borrowers might lose employment. A lender might not yet bake this into its consumer credit model, but they could overlay a higher loss expectation for unsecured loans in areas with high employment in automatable jobs. While not yet as common as macro overlays, some large lenders have begun discussing technology/AI risk in credit. We might see, for instance, an overlay scenario of “AI transition” where default rates for certain industries are stressed. So far, tech disruption has often been treated qualitatively in sector expert assessments rather than formal overlays, but it's emerging. The question explicitly highlights AI disruption, indicating that it is on radar as an overlay-worthy risk. As of 2025, this is becoming more common practice, especially as AI adoption accelerates.
- **Climate Change and ESG Factors:** Climate-related risks are a major emerging factor now being captured by overlays. This includes both physical risks (e.g. extreme weather events, wildfires,

floods that can impair assets and operations) and transition risks (e.g. carbon pricing, regulatory changes, shifting consumer preferences away from high-carbon products). Because climate risk is forward-looking and not well represented in past default data, lenders are using qualitative approaches. Some pioneer lenders have introduced climate overlays – for example, *re-rating clients assuming higher carbon taxes or costs for emissions, thereby modeling “environmental risk-driven defaults.”* In fact, 12% of banks in one ECB sample were using overlays to add environmental risk into provisions (ECB 2023). Common practice might be an overlay on portfolios like Oil & Gas, Coal Mining, or other carbon-intensive sectors: essentially increasing PDs or staging due to anticipated climate policy impact. Another angle is physical climate: lenders may overlay additional expected loss for mortgages in flood-prone areas or agricultural loans in drought-prone regions, if their models don’t incorporate the latest climate science. ESG overlays could also cover social risk or governance factors if material (though climate is the clearest case so far). Regulators are encouraging this – e.g. the Bank of England noted banks are at early stages and see scope to embed climate risks in loan-level assessments and challenge the completeness of overlays for climate risks. Over time, as climate risk assessment improves, these might become in-model adjustments, but currently overlays are a primary tool.

- **Geopolitical and Political Risks:** Beyond trade, broader geopolitical risks (war, sanctions, political instability) are being overlayed. The Russia-Ukraine war is a case where nearly all banks had to overlay to some extent, not just for direct exposure but second-order effects (energy prices, investor confidence, cyber risk). Even the threat of conflict (e.g. tensions in the South China Sea) could spur a forward-looking overlay for high-risk scenarios. Political risk in domestic policy – such as sudden changes in regulations, taxation, or even things like a government-led debt relief program – can also prompt overlays since models wouldn’t incorporate a new law until after it hits.
- **Pandemic and Health Risks:** COVID-19 was a wake-up call, and while we hope it’s a once-in-a-century event, banks are now more cognizant of pandemic risk. If signs of a new pandemic emerge (e.g. WHO warnings of a spreading virus), banks might quickly add overlays for affected sectors (travel, hospitality) rather than wait for model recalibration. This is an emerging playbook: essentially a contingent overlay for health crises. It’s now somewhat *common practice* to consider that in scenario planning, even if no active overlay exists when not needed.
- **Other Macro-structural Risks:** This includes things like sharp currency devaluations (for banks in emerging markets or with FX exposures), sovereign debt crises (banks might overlay for credit portfolio quality if a sovereign default seems possible, as models often treat sovereign impact as static), or financial market contagion (like a sudden spike in corporate bond yields that could presage defaults). These factors may be indirectly captured via scenarios, but if not, an overlay could be used.

In effect, overlays now commonly **capture a range of forward-looking risks: trade disputes, inflation spikes, energy shocks, climate transition, and technological changes** – all of which share the trait of being insufficiently reflected in historical data. Banks have been expanding their risk taxonomy to make sure these novel risks are considered for overlays. As the ECB noted, banks acknowledge novel risks and try to capture them and overlays became prevalent during the pandemic and are now widely used for other novel risks.

Emerging Risk Factors Not Yet Fully Captured

While many emerging risks are now on banks' and non-bank institutions' radar, there are some that arguably should be captured via overlays but are not yet common practice, either because they are very new, hard to quantify, or not widely recognised:

- **Cybersecurity Risk as a Credit Risk Driver:** Cyber attacks can cripple businesses operationally and financially, potentially leading to defaults (think of a ransomware attack that halts a company's revenue for weeks). To date, most credit models do not incorporate cyber risk explicitly. Banks typically handle it qualitatively (e.g. via operational risk or in the qualitative assessment of a borrower's management quality). It's rare to see a formal overlay like "we expect X% higher defaults due to cyber attacks in our portfolio." However, given the frequency and severity of cyber incidents, this is an emerging risk that arguably *should* be considered. In the future, we might see overlays for sectors with high cyber vulnerability (e.g. critical infrastructure, hospitals) or generally a buffer for systemic cyber events. The challenge is quantification – cyber risk is unpredictable. Nonetheless, scenario analysis (what if a major cloud provider goes down?) could inform an overlay. Regulators have not yet pressed for cyber credit risk overlays, but they do highlight cyber as a major risk to the economy, so forward-looking banks might start doing this.
- **Second-Order Climate/Nature Risks:** While climate change overlays for carbon transition are becoming common, nature-related risks (biodiversity loss, water scarcity) are not yet mainstream in credit risk. For example, water stress could severely impact agribusiness or power generation, but few banks have explicit overlays for water risk. Similarly, biodiversity loss (like collapse of fisheries, pollinator loss affecting agriculture) could hit certain borrowers. These risks are only beginning to be studied; there's an argument that banks should incorporate them qualitatively now rather than wait for data. An "emerging risk overlay" could be set aside for portfolios highly exposed to such risks. This is not yet common, partly because methodologies are in infancy. The EBA's discussion on environmental risk suggests careful supervisory review of any such model overlays – implying it's so new that if a bank does it, regulators will scrutinise

consistency. Over time, expect more focus here.

- **Macroprudential or Systemic Financial Risks:** Individual banks tend not to overlay for systemic financial system risks (like housing bubbles or shadow banking stress) beyond what their macro scenarios include. But one could argue that in environments of asset price bubbles or extremely high leverage in parts of the economy, banks should add overlays for potential systemic shocks. For instance, if house prices are surging unsustainably, a bank's mortgage model might still show low PDs (people paying on time in a good economy), but a prudent bank might overlay an additional provision anticipating a possible correction. Not all do, often relying on regulators to impose countercyclical buffers instead. This is emerging because after the Global Financial Crisis, most banks improved models, but as new asset bubbles form (e.g. crypto or tech valuations), not all credit models capture the knock-on default risk if those bubbles burst. So far, there are few formal overlays in this area.
- **Demographic Shifts:** Long-term demographic changes (aging populations, urbanization shifts) might affect credit in sectors like housing, healthcare, or education loans. These are slow-moving and usually not considered in short-term credit provisions. But in some regions, say a bank in a town that is steadily losing population and economic base, a forward-looking overlay could be justified (the model might not flag it until losses actually start rising). It's uncommon, but some community banks effectively do this informally by being more conservative in shrinking areas – a formal overlay is a possibility to ensure enough reserves for the anticipated decline.
- **Political/Policy Risk (domestic):** While trade wars have been a focus recently, domestic political risks like radical policy changes (e.g. a new government that might enforce **debt jubilees**, or **rent controls**) are not typically overlaid unless imminent. In certain jurisdictions, this could be relevant. For example, if a country is heading into an election where a leading candidate proposes widespread debt forgiveness, banks might consider an overlay for collection risk. Not common due to sensitivity and unpredictability, but this is an emerging consideration especially in some emerging markets.
- **New Economic Regimes:** The post-pandemic world has raised questions about a new inflation regime or higher interest rate volatility. Models built on Great Moderation data might understate volatility. Some banks are overlaying implicitly via scenario weights. However, an explicit overlay for **regime change risk** (uncertainty in model due to regime shift) could be considered. Not many do this explicitly; they usually capture it partially with conservative scenario weighting. But if one expects, say, persistently higher inflation variability, an overlay to PDs or LGDs to reflect more frequent recessions could be forward-looking.
- **Social Unrest or Political Violence:** In some regions, increases in social unrest could impact businesses (through disruptions or damage). This is a bit like political risk, but at a societal level. Not a typical overlay category, yet in countries with significant protests or unrest (affecting

tourism, retail sales, etc.), a bank might start to factor that qualitatively.

These not-yet-common overlays often fail to be implemented because they are hard to measure or haven't caused losses historically (so management might be skeptical of provisioning early). However, best practice would suggest that if a risk is plausible and could cause significant loss, it should at least be discussed in the overlay context.

Examples of Qualitative Overlays in Action

To illustrate how qualitative overlays work, here are three examples of overlays that banks have applied or could apply, addressing specific emerging risks:

Example 1: Trade Tariff Shock Overlay (U.S.–China Trade War) – The new tariffs recently imposed by the U.S. administration on a range of imports (auto, steel, aluminum, and others). A European bank with a corporate loan portfolio is concerned that these tariffs, and China's retaliatory tariffs, would harm some of its borrowers – for instance, a German machinery exporter selling to Chinese customers and a Dutch steel importer facing higher input costs. The bank's credit models did not incorporate the impact of sudden tariffs, as there was no precedent in the data. In response, the bank's risk management implemented a qualitative overlay for trade-war exposure. They identified a set of, say, 50 corporate borrowers across industries like auto parts, machinery, and agriculture that were directly impacted by the new tariffs. They performed an expert assessment: estimating revenue declines for those firms, and how that would translate to higher default risk. The outcome was an overlay that effectively downgraded the internal ratings of those 50 names by a notch or two, leading to higher PDs. In IFRS 9 terms, many of those exposures were moved to Stage 2 (significant increase in credit risk), and an extra collective ECL allowance was booked on these trade-sensitive exposures above what the model alone predicted. The overlay was documented as **Trade Tariff Macro Overlay** with justification that heightened protectionist measures by the US increase default risk for export-oriented borrowers. Over the next year, the bank monitors these borrowers. If some showed actual deterioration (through financials or missed payments), the model would catch up (and the overlay might then be released or reduced to avoid double counting). This overlay ensured the bank was buffered for potential losses from the trade dispute.

Example 2: AI-Induced Job Disruption Overlay – Consider a regional bank with a large portfolio of personal loans and credit card exposures in a particular city where a major employer is a call-center company. In 2025, suppose a new generative AI technology becomes widely adopted in customer service, leading that employer to announce it will cut 30% of its call center jobs over the next year. The bank anticipates that many of those employees (who are its borrowers) will face unemployment or lower income, which could increase defaults on their loans. The bank's consumer credit score models

do factor in unemployment rates generally, but they do not have a way to incorporate a specific technological shock to a segment of borrowers. The bank decides to apply a targeted overlay on its unsecured consumer loans for AI-related job risk. It gathers data: say 1,000 borrowers work at that call center (from loan applications where the employer was listed). The bank estimates, based on the job cut announcement, maybe 300 will lose jobs. Historically, the loss given default on loans for unemployed borrowers might be, e.g., 40% higher. So the bank calculates an additional expected loss if those 300 lose jobs. To be conservative, they overlay (or some fraction if partially covered by macro scenario) on the allowance for the credit card portfolio. Alternatively, if precise data isn't available, the bank might instead broadly increase the PD for all personal loans in that city or in industries prone to AI automation by a certain multiplier for the next 12 months. The overlay is reviewed by the bank's model risk committee and approved as a temporary measure. It will be reassessed in a year – if many borrowers did lose jobs and defaults did rise, some of the overlay might prove justified and possibly be integrated into the model (e.g. adding employment sector risk to the scorecard). If the feared disruption doesn't fully materialise (perhaps many find new jobs), the overlay could be released.

Example 3: Climate Transition Risk Overlay (Carbon Price Increase) – A large international bank is exposed to a number of high-carbon corporate clients – say, power generation companies, cement manufacturers, and airlines. The bank's internal credit models for these corporates are based largely on financials and current operations. However, the bank is acutely aware of climate transition risk: there is a global push for carbon pricing and stricter emissions regulations. Suppose the bank expects that within 5 years, a carbon tax or emissions trading scheme will significantly increase costs for these companies, potentially impairing their profitability and raising default risk. There is no historical default data that captures default due to carbon pricing, so the bank uses a qualitative overlay to incorporate climate transition risk. One approach is an overlay scenario analysis: the bank projects how each high-carbon client's debt service capacity would change – perhaps using industry studies or company disclosures about emissions. This analysis might reveal, for example, that two smaller coal-dependent power firms in its portfolio would likely become unprofitable, increasing their 5-year default probability substantially. Based on this, the bank applies an overlay that effectively moves those firms (and others materially affected) into Stage 2 under IFRS 9, with a longer-term PD reflecting the climate policy risk. It might add, say, an extra 0.5% to the PD of all airlines and cement companies in its book to cover the eventual transition cost impact.

These examples – trade tariffs, AI disruption, and climate transition – each show a scenario where human judgment and forward-looking analysis augment the model. They highlight the flexibility of qualitative overlays to tackle diverse risk drivers: political, technological, and environmental. In each case, the overlay is essentially a placeholder for risk awareness – acknowledging a risk that's real and material, even if the precise timing or impact is uncertain.

Conclusion

Qualitative overlays and overrides are indispensable tools in modern credit risk management, allowing

banks and non-bank institutions to respond swiftly to new information and ensure risk measures remain credible. Bank regulators in the UK and Eurozone provide guidance to ensure these overlays are used judiciously – encouraging evidence-based, granular adjustments with strong governance. Market practice shows that banks big and small use overlays to cover data gaps and emerging risks, though with varying degrees of sophistication. Overlays are applied across all asset classes, from retail credit cards to commercial real estate, tailored to each portfolio's characteristics and vulnerabilities. Non-bank lenders similarly rely on qualitative judgments, albeit with more flexibility outside the regulatory spotlight. Often non-bank lenders lack suitable credit portfolio management systems to manage their overlays. Looking ahead, innovations like generative AI can enhance overlay processes, making them more systematic and well-informed. As the risk landscape evolves with factors like trade tensions, rapid tech change, and climate urgency, qualitative overlays will continue to play a critical role in capturing these high-level, high-impact risks that models struggle with. The key is to manage overlays as a *complement* to models – neither neglecting model improvements nor leaving risk unmitigated until models catch up. With rigorous governance and forward-looking vision, banks can use qualitative overlays to maintain resilience against the uncertainties of the future, ensuring that credit risk models plus expert overrides together provide a true and timely view of risk. An advanced technical infrastructure that implements the overlay assumptions, scenarios and justifications including a governance framework with fully auditable record keeping is essential.

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- ECB Supervisory Board, *"Overlays and in-model adjustments: capturing novel risks,"* May 2023 – notes that most banks use overlays for emerging risks and gives examples of overlays for inflation, geopolitical and environmental risks [bankingsupervision.europa.eu](https://bankingsupervision.europa.eu/bankingsupervision.europa.eu)
- KPMG, *"Credit risk supervision – ECB priorities,"* 2023 – summarises that overlays are the most common tool to capture novel risks, though 80% of banks didn't consider environmental risk, and warns against over-reliance on legacy overlays kpmg.com.
- PRA (Bank of England) Letter, Sept 2024 – emphasises challenging the completeness of PMAs/overlays so that provisions reflect actual credit risk (e.g. higher rates affecting affordability) bankofengland.co.uk.
- Deloitte UK, *"Don't Let Overlays Become Oversights,"* 2025 – discusses regulatory focus on post-model adjustments, noting PRA and ECB expectations. Outlines reasons for overlays, e.g. risks not in models (Taiwan/semiconductor example) and model limitations (no rate hike data in sample).
- EBA IFRS 9 Monitoring Report, Nov 2023 – finds extensive use of overlays with high judgment, urges granular (parameter-level) overlays and integration of climate risks. EBA warns that overlays mainly at ECL output level add variability across banks and expects improvement in overlay calibration. EBA notes very few banks account for climate risk in ECL models yet
- Risk.net, *"European regulators turn up the heat on IFRS 9 overlays,"* 2023 – reports that EBA and BoE have warned against too many judgmental overlays becoming permanent.

- Risk.net, *"Amid tariff turmoil, banks warned not to fudge IFRS 9 overlays,"* Apr 2025 – highlights that flip-flopping U.S. trade policy forced EU banks to rely on discretionary overlays for provisions, and regulators were watching closely.
- EBA Discussion Paper on Environmental Risk, 2022 – cautions supervisors to scrutinise IRB model overlays for climate risk, as inconsistent overlays on forward-looking elements (climate) can lead to variability eba.europa.eu. Suggests need for harmonization in how such novel risks are treated.
- OCC Comptroller's Handbook on Model Risk, 2021 – acknowledges banks use model overlays (qualitative adjustments) to compensate for model limitations and stresses they should be subject to review, documentation, and back-testing like any model component occ.treas.gov.

About Accuria

Accuria is a cutting-edge credit portfolio management platform that helps clients trade and monitor loan portfolios using a series of domain expert AI agents to automate the processing of data, documents and transactions. Accuria offers automated due diligence, data migration, valuation and reporting services for performing and non performing assets across 28 jurisdictions.

With the help of its proprietary data mapping and transformation tool Accuria helps financial institutions to map their data to a variety of data formats such as those defined by EBA for NPL transactions, EBA for the valuation in resolution, and by ESMA for securitisation disclosures. Once standardised and validated, the loan-level data can be uploaded to the Accuria valuation tool to conduct a detailed discounted cash flow analysis using pre-populated pricing parameters in different macroeconomic scenarios across all major asset classes.

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