AI in Insurance

Interview preparation summary · IN track

INT.XI.1.a · AI in Insurance

Use an AI assistant to scan and summarise policy wordings, claims files, submissions and loss data, and verify the output against the source before relying on it.

An AI assistant approved by your firm can read a long policy wording, a broker submission or a loss run in minutes and give you a first view: the structure, the key clauses, the headline figures and the questions to ask. It is a fast reader, not a source. It can invent a clause number, a case reference or a figure, mix up units or years, and write a smooth summary that drops the one caveat that matters, such as a sub-limit, a notification deadline or the outstanding part of a loss. So ask it for clause or page references and open each one; recompute every figure against the table it came from; check dates and currency; and prompt for what is not there, such as every exclusion, condition and limit, with the answer none found if there are none. Never paste customer, claimant, health or confidential broker data into a public tool, and follow your firm's policy on approved tools. A good answer names the check for each risk, not just a general warning.

WORKED EXAMPLE: CHECKING AN AI SUMMARY OF A FIVE-YEAR LOSS RUN

An invented underwriter, Marlowe Underwriting, asks an AI assistant to summarise a five-year loss run for a commercial property account with 2,400 thousand pounds of premium over the period. The summary says: six large losses, total cost 1,080 thousand pounds, best contained account, 45.0 per cent loss ratio, largest loss 440 thousand pounds. The source table shows, in thousands of pounds, paid and outstanding by claim: paid 310, 95, 440, 60, 150 and 25; outstanding 120, 205, 0, 340, 50 and 175. Test the summary. Conventions: loss ratio is incurred (paid plus outstanding) divided by premium; ignore expenses and recoveries.

Answer: The summary's figures are accurate but its conclusion is not. On an incurred basis the loss ratio is 82.1 per cent, not 45.0, and 45.2 per cent of the cost is still outstanding.

> **Interview tip:** Say what you asked the assistant for, then say the check that changed the answer: you reconciled paid and outstanding to the source and found the summary had called paid cost the whole loss. Finish with what you would tell the underwriter.

INT.XI.1.b · AI in Insurance

Use AI to check and build pricing, reserving and loss analysis, test its arithmetic and formulas on known cases, and document what was AI-assisted.

AI is useful for challenging a workbook: asking it to list the assumptions in a reserving or pricing model, to find formulas that do not match their neighbours, to suggest sense checks, and to write a formula or a short script you would otherwise build slowly. The danger is that it writes text, so a number can look worked out and still be wrong, and it cannot see your data unless it has been given it. So recompute every figure yourself in the spreadsheet or code; test any generated formula on a small case with a known answer and on an edge case such as zero exposure; reconcile totals back to the source or ledger; and note that matching last year's output proves only consistency. Guard against a story that fits the data too neatly: ask for competing explanations and test each. Record what was AI-assisted, the prompt, the tests and who reviewed it, so the work can be reproduced. Interviewers want to hear that you checked, not that you trusted.

WORKED EXAMPLE: CATCHING A DROPPED DEVELOPMENT FACTOR

An invented insurer, Ashgrove Insurance, asks an AI assistant to project a cumulative paid triangle (thousands of pounds). Accident year 2022 paid 1,000 at 12 months, 1,450 at 24 and 1,595 at 36. Accident year 2023 paid 1,100 at 12 and 1,650 at 24. Accident year 2024 paid 1,200 at 12 months. The assistant says the 2024 ultimate is 1,771 because it applied the 12 to 24 factor of 1.4762 only. Check it. Conventions: volume-weighted factors, no tail beyond 36 months, paid only.

Answer: The 2024 ultimate is about 1,949 thousand, not 1,771. The assistant's arithmetic on each factor was right, but it left out a step.

> **Interview tip:** Say that you would use the assistant to speed the build and then test it on a case you can do by hand. Name the specific error you found and how you recorded it.

INT.XI.1.c · AI in Insurance

Use AI to draft underwriting, claims and customer communications in house style, edit them for accuracy and fairness, and stay accountable for the result.

AI can turn your facts into a first draft of a referral note, a broker email, a claims update or a customer letter in the house style. The structure and the recommendation must still come from you: decide what you want to say, give the assistant the verified facts, and then edit hard. Check every figure, date, clause reference and commitment against the file; fluent text can sound certain when the file is disputed, and can drift into a tone that is cold or unfair to a customer, especially a vulnerable one. Keep personal and confidential data out of public tools, keep the original facts and the prompt, and make sure the decision-maker signs off on what is sent. Be honest with colleagues about where AI helped. In an interview, describe the tasks you used it for, one place you did not trust it and what you did instead. Do not delegate judgement about cover, fraud, vulnerability or reserves.

WORKED EXAMPLE: EDITING AN AI-DRAFTED SETTLEMENT LETTER

An invented insurer, Pennard Mutual, has agreed a repair cost of 9,640 pounds on a motor claim. The policy excess is 350 pounds. An AI assistant drafts a letter saying 'we will pay you 9,640 pounds within 5 working days' and that the repair of wear and tear is excluded under clause 7.2. Pennard's service standard is payment within 10 working days of agreement, and the wording's wear and tear exclusion is clause 7.4. Edit the draft. Conventions: ignore tax and betterment.

Answer: The letter should say 9,290 pounds within 10 working days, cite clause 7.4 only if it applies, and carry an approving name. Three errors came from fluent text: the amount, the promise and the clause.

> **Interview tip:** Say that the structure and decision were yours, that you checked each fact against the file, and give the specific errors you caught. It shows judgement, not just tool use.

Summary of the Charta interview-preparation topic. Companies and figures in the examples are invented. Draft content, not yet expert reviewed.