

Build the Expert System

Companion Toolkit · Version 1.0

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For owner-operators and accountable business or department leaders. Core companion value; free community access; no book purchase required.

Use real business evidence, keep confidential information inside approved company systems, and retain human accountability for consequential decisions.

How to use this toolkit

Move chapter by chapter or begin with the worksheet that matches the decision in front of you. Each worksheet is private by default. Share only anonymized lessons in CEO Leverage unless your company has explicitly approved broader disclosure.

Chapter crosswalk

- Chapter 1: Human API and Expertise Inventory — Capture five consequential requests that repeatedly route to one experienced person, then select one Human API to investigate.
- Chapter 2: Qualification Gap — Identify the distance between general capability and earned role competence.
- Chapter 3: Ten-Case Classification — Use ten recent real cases. Find the shape of the work rather than proving the expert is brilliant.
- Chapter 4: Company Context START HERE Router — Do not upload the whole company. Make one bounded domain legible without guessing.
- Chapter 5: Stakeholder Win Map — Map the three stakeholders most able to enable, block, or materially reshape one consequential decision.
- Chapter 6: River Map — A decision is the network of consequences attached to it.
- Chapter 7: Experience Bomb Record — Preserve the evidence and uncertainty; do not clean the incident into folklore or blame.
- Chapter 8: Expert Method Record — Make the method explicit enough that another qualified person can inspect it.
- Chapter 9: Competence Boundary and Right-to-Answer Gate — Test a known case, known edge, missing evidence, source conflict, novel case, and out-of-boundary consequence.
- Chapter 10: Validation Set — Write the test before granting the capability permission.
- Chapter 11: Anomaly-Review Record — Teach the organization how to change its mind responsibly.
- Chapter 12: Capability Readiness Review — Systems should absorb repeatability. Humans should remain closest to consequence.

Chapter 1 — Human API and Expertise Inventory

Capture five consequential requests that repeatedly route to one experienced person, then select one Human API to investigate.

Record 1

Request	
Trigger	
Who asks	
Current expert/decider	
Consequence	
Who else is affected	
Normal versus exceptional	
Evidence trail	
Possible next step	

Record 2

Request	
Trigger	
Who asks	
Current expert/decider	
Consequence	
Who else is affected	
Normal versus exceptional	
Evidence trail	
Possible next step	

Record 3

Request	
Trigger	
Who asks	
Current expert/decider	
Consequence	
Who else is affected	
Normal versus exceptional	
Evidence trail	
Possible next step	

Record 4

Request	
Trigger	
Who asks	
Current expert/decider	
Consequence	
Who else is affected	
Normal versus exceptional	
Evidence trail	
Possible next step	

Record 5

Request	
Trigger	
Who asks	
Current expert/decider	
Consequence	
Who else is affected	
Normal versus exceptional	
Evidence trail	
Possible next step	

Decision and next action

Decision	
Evidence supporting it	
Accountable human	
Next action	
Stop or review condition	

Chapter 2 — Qualification Gap

Identify the distance between general capability and earned role competence.

Company-specific operating context	
Precedents	
Edge cases and unusual variations	
Stakeholders and legitimate constraints	
Authority and approval boundaries	
Failure modes	
Evidence of competence in the real decision environment	
What a smart newcomer must still learn or prove	

Decision and next action

Decision	
Evidence supporting it	
Accountable human	
Next action	
Stop or review condition	

Chapter 3 — Ten-Case Classification

Use ten recent real cases. Find the shape of the work rather than proving the expert is brilliant.

Record 1

Case	
Initial normal signal	
Signal/fact/exception that changed classification	
Classification: normal, known variation, known edge, or truly novel	
Who handled it	
Prior rule, case, or experience	
Current system: handle, handle with review, or escalate	

Record 2

Case	
Initial normal signal	
Signal/fact/exception that changed classification	
Classification: normal, known variation, known edge, or truly novel	
Who handled it	
Prior rule, case, or experience	
Current system: handle, handle with review, or escalate	

Record 3

Case	
Initial normal signal	
Signal/fact/exception that changed classification	
Classification: normal, known variation, known edge, or truly novel	
Who handled it	
Prior rule, case, or experience	
Current system: handle, handle with review, or escalate	

Record 4

Case	
Initial normal signal	
Signal/fact/exception that changed classification	
Classification: normal, known variation, known edge, or truly novel	
Who handled it	
Prior rule, case, or experience	
Current system: handle, handle with review, or escalate	

Record 5

Case	
Initial normal signal	
Signal/fact/exception that changed classification	
Classification: normal, known variation, known edge, or truly novel	
Who handled it	
Prior rule, case, or experience	
Current system: handle, handle with review, or escalate	

Record 6

Case	
Initial normal signal	
Signal/fact/exception that changed classification	
Classification: normal, known variation, known edge, or truly novel	
Who handled it	
Prior rule, case, or experience	
Current system: handle, handle with review, or escalate	

Record 7

Case	
Initial normal signal	
Signal/fact/exception that changed classification	
Classification: normal, known variation, known edge, or truly novel	
Who handled it	
Prior rule, case, or experience	
Current system: handle, handle with review, or escalate	

Record 8

Case	
Initial normal signal	
Signal/fact/exception that changed classification	
Classification: normal, known variation, known edge, or truly novel	
Who handled it	
Prior rule, case, or experience	
Current system: handle, handle with review, or escalate	

Record 9

Case	
Initial normal signal	
Signal/fact/exception that changed classification	
Classification: normal, known variation, known edge, or truly novel	
Who handled it	
Prior rule, case, or experience	
Current system: handle, handle with review, or escalate	

Record 10

Case	
Initial normal signal	
Signal/fact/exception that changed classification	
Classification: normal, known variation, known edge, or truly novel	
Who handled it	
Prior rule, case, or experience	
Current system: handle, handle with review, or escalate	

Decision and next action

Decision	
Evidence supporting it	
Accountable human	
Next action	
Stop or review condition	

Chapter 4 — Company Context START HERE Router

Do not upload the whole company. Make one bounded domain legible without guessing.

Controlling policy source	
Current-state record	
Decision and supersession record	
Decision owner/approver	
Evidence source	
Restricted information and authorized users	
Source-conflict action	
Exceptions, overrides, or current commitments	
Continuity record	
Decision: proceed to extraction or repair context debt	

Decision and next action

Decision	
Evidence supporting it	
Accountable human	
Next action	
Stop or review condition	

Chapter 5 — Stakeholder Win Map

Map the three stakeholders most able to enable, block, or materially reshape one consequential decision.

Record 1

Stakeholder	
Responsibility	
What they can lose	
Actual authority	
What the decision needs from them	
What they depend on	
Evidence-backed outcome needed	
Credible win	
Unverified hypothesis	
What cannot be traded	
Tradeoff decision owner	

Record 2

Stakeholder	
Responsibility	
What they can lose	
Actual authority	
What the decision needs from them	
What they depend on	
Evidence-backed outcome needed	
Credible win	
Unverified hypothesis	
What cannot be traded	
Tradeoff decision owner	

Record 3

Stakeholder	
Responsibility	
What they can lose	
Actual authority	
What the decision needs from them	
What they depend on	
Evidence-backed outcome needed	
Credible win	
Unverified hypothesis	
What cannot be traded	
Tradeoff decision owner	

Decision and next action

Decision	
Evidence supporting it	
Accountable human	
Next action	
Stop or review condition	

Chapter 6 — River Map

A decision is the network of consequences attached to it.

Upstream Conditions	
System of Record	
Decision Point	
Cross-Effects	
Downstream Consumers	
Failure Propagation	
Accountable Human Owner	
Unknowns left blank rather than guessed	
Decision: proceed, revise, or stop	

Decision and next action

Decision	
Evidence supporting it	
Accountable human	
Next action	
Stop or review condition	

Chapter 7 — Experience Bomb Record

Preserve the evidence and uncertainty; do not clean the incident into folklore or blame.

Situation	
Apparent Problem	
Actual Problem	
Misleading Signals	
Context	
Decision	
Consequence	
Remediation	
Lesson	
Future Trigger	
Boundary / Escalation	
What changed: cue, source check, rule, test, example, approval, or escalation	

Decision and next action

Decision	
Evidence supporting it	
Accountable human	
Next action	
Stop or review condition	

Chapter 8 — Expert Method Record

Make the method explicit enough that another qualified person can inspect it.

Trigger	
Inputs	
Vocabulary	
Decision Rule / Method	
Evidence / Source	
Output	
Exception	
Representation	
Representation owner: source, rule, case, tool, model judgment, or retained human decision	
Decision: proceed, extract more, resolve source, retain human, or rebound	

Decision and next action

Decision	
Evidence supporting it	
Accountable human	
Next action	
Stop or review condition	

Chapter 9 — Competence Boundary and Right-to-Answer Gate

Test a known case, known edge, missing evidence, source conflict, novel case, and out-of-boundary consequence.

Record 1

Case	
Case Fit: pass, fail, or hold	
Evidence: sufficient, missing, or conflicted	
Authority: inside or outside	
Consequence: inside or outside	
Allowed action: ANSWER, ASK, RETRIEVE, ABSTAIN, or ESCALATE	
What must change before proceeding differently	

Record 2

Case	
Case Fit: pass, fail, or hold	
Evidence: sufficient, missing, or conflicted	
Authority: inside or outside	
Consequence: inside or outside	
Allowed action: ANSWER, ASK, RETRIEVE, ABSTAIN, or ESCALATE	
What must change before proceeding differently	

Record 3

Case	
Case Fit: pass, fail, or hold	
Evidence: sufficient, missing, or conflicted	
Authority: inside or outside	
Consequence: inside or outside	
Allowed action: ANSWER, ASK, RETRIEVE, ABSTAIN, or ESCALATE	
What must change before proceeding differently	

Record 4

Case	
Case Fit: pass, fail, or hold	
Evidence: sufficient, missing, or conflicted	
Authority: inside or outside	
Consequence: inside or outside	
Allowed action: ANSWER, ASK, RETRIEVE, ABSTAIN, or ESCALATE	
What must change before proceeding differently	

Record 5

Case	
Case Fit: pass, fail, or hold	
Evidence: sufficient, missing, or conflicted	
Authority: inside or outside	
Consequence: inside or outside	
Allowed action: ANSWER, ASK, RETRIEVE, ABSTAIN, or ESCALATE	
What must change before proceeding differently	

Record 6

Case	
Case Fit: pass, fail, or hold	
Evidence: sufficient, missing, or conflicted	
Authority: inside or outside	
Consequence: inside or outside	
Allowed action: ANSWER, ASK, RETRIEVE, ABSTAIN, or ESCALATE	
What must change before proceeding differently	

Decision and next action

Decision	
Evidence supporting it	
Accountable human	
Next action	
Stop or review condition	

Chapter 10 — Validation Set

Write the test before granting the capability permission.

Record 1

Case that must work or stop	
Case type: normal, edge, or mandatory stop	
Expected behavior	
Evidence of a pass	
Reviewer	
Acceptance criteria	
Stop condition	
Result	

Record 2

Case that must work or stop	
Case type: normal, edge, or mandatory stop	
Expected behavior	
Evidence of a pass	
Reviewer	
Acceptance criteria	
Stop condition	
Result	

Record 3

Case that must work or stop	
Case type: normal, edge, or mandatory stop	
Expected behavior	
Evidence of a pass	
Reviewer	
Acceptance criteria	
Stop condition	
Result	

Record 4

Case that must work or stop	
Case type: normal, edge, or mandatory stop	
Expected behavior	
Evidence of a pass	
Reviewer	
Acceptance criteria	
Stop condition	
Result	

Record 5

Case that must work or stop	
Case type: normal, edge, or mandatory stop	
Expected behavior	
Evidence of a pass	
Reviewer	
Acceptance criteria	
Stop condition	
Result	

Record 6

Case that must work or stop	
Case type: normal, edge, or mandatory stop	
Expected behavior	
Evidence of a pass	
Reviewer	
Acceptance criteria	
Stop condition	
Result	

Decision and next action

Decision	
Evidence supporting it	
Accountable human	
Next action	
Stop or review condition	

Chapter 11 — Anomaly-Review Record

Teach the organization how to change its mind responsibly.

Unexpected signal	
Current model	
Alternative variable or hypothesis	
Proposed test	
Evidence	
Accountable owner	
Decision	
Version impact	
Rollback state	

Decision and next action

Decision	
Evidence supporting it	
Accountable human	
Next action	
Stop or review condition	

Chapter 12 — Capability Readiness Review

Systems should absorb repeatability. Humans should remain closest to consequence.

Work is bounded	
Company Context is governed	
Stakeholders and authority are explicit	
Expert method is represented	
Cases, counterexamples, edges, and failures are represented	
Evidence requirements are clear	
Right-to-Answer Gate works	
Escalation and retained approvals are defined	
Output and rationale are inspectable	
Audit record exists	

Capability Readiness Review — continued

Important validation cases passed	
Learning loop has an owner	
Residual boundaries are explicit	
Post-deployment monitoring is defined	
Named human owns the frontier	
Decision: PASS, REVISE, RESTRICT, or STOP	
Evidence for decision	
Conditions and controls	
Next review	

Decision and next action

Decision	
Evidence supporting it	
Accountable human	
Next action	
Stop or review condition	