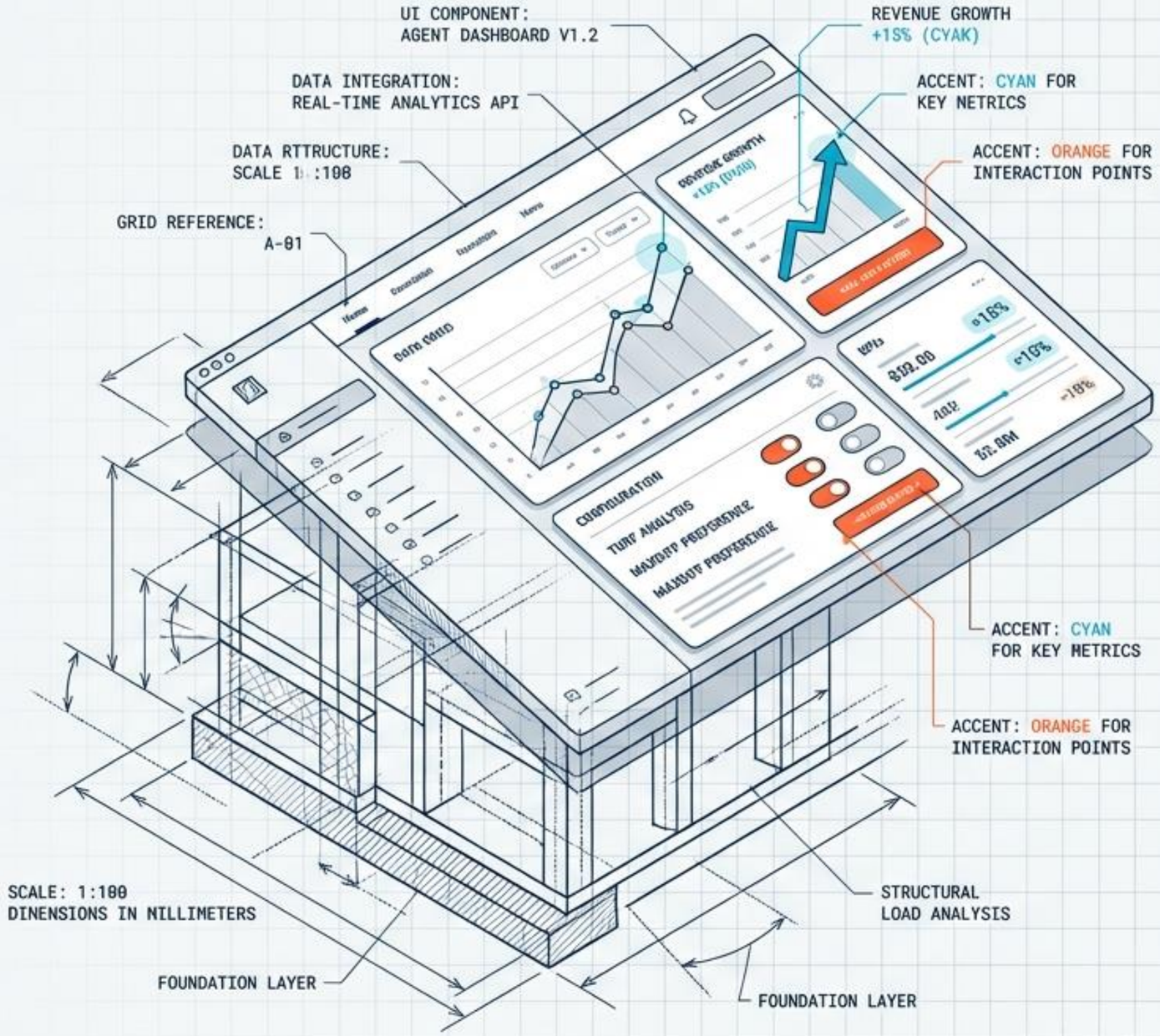
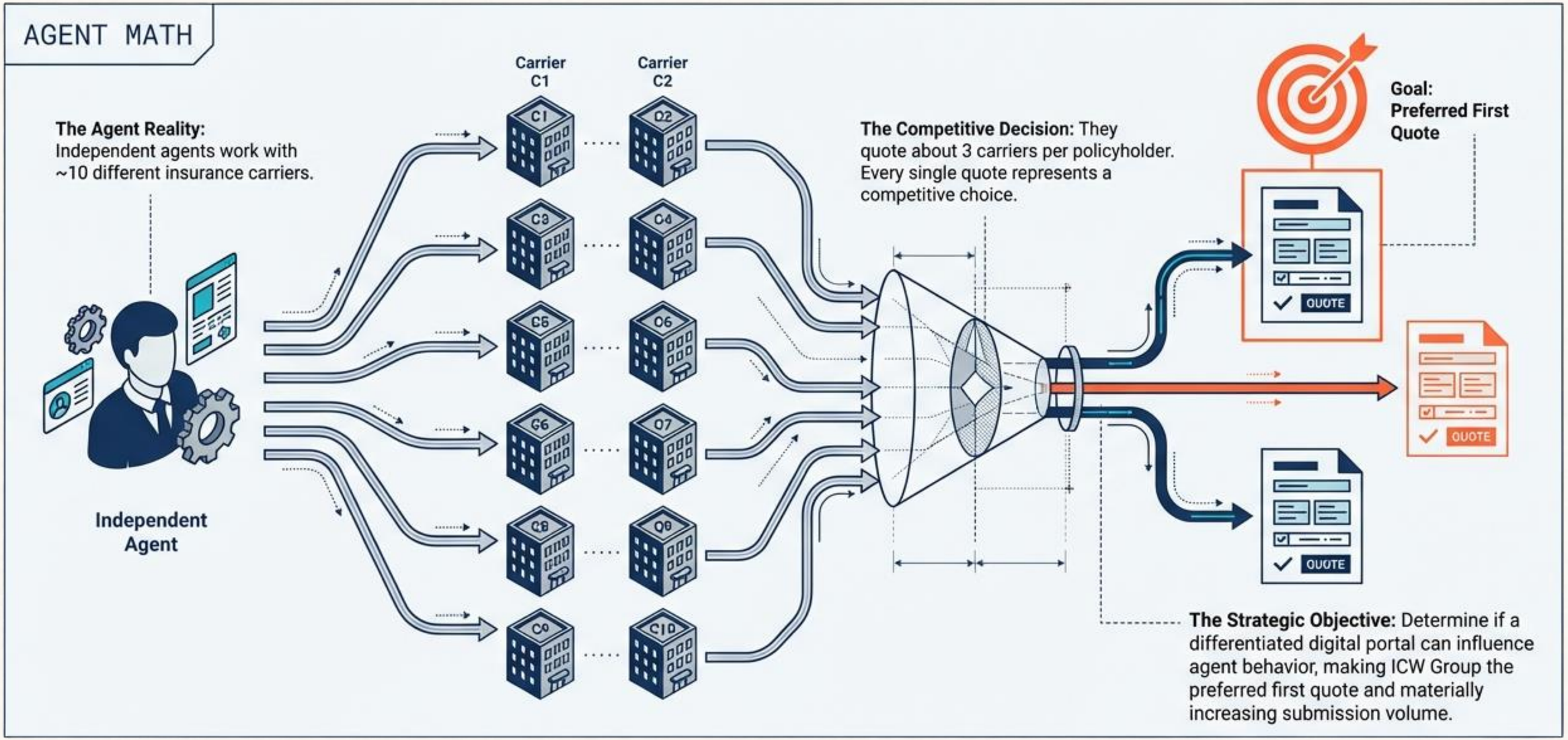
When Data Says Yes, But Development Says No

ICW Group Insurance | Agent Portal Research | Kristin Guthrie

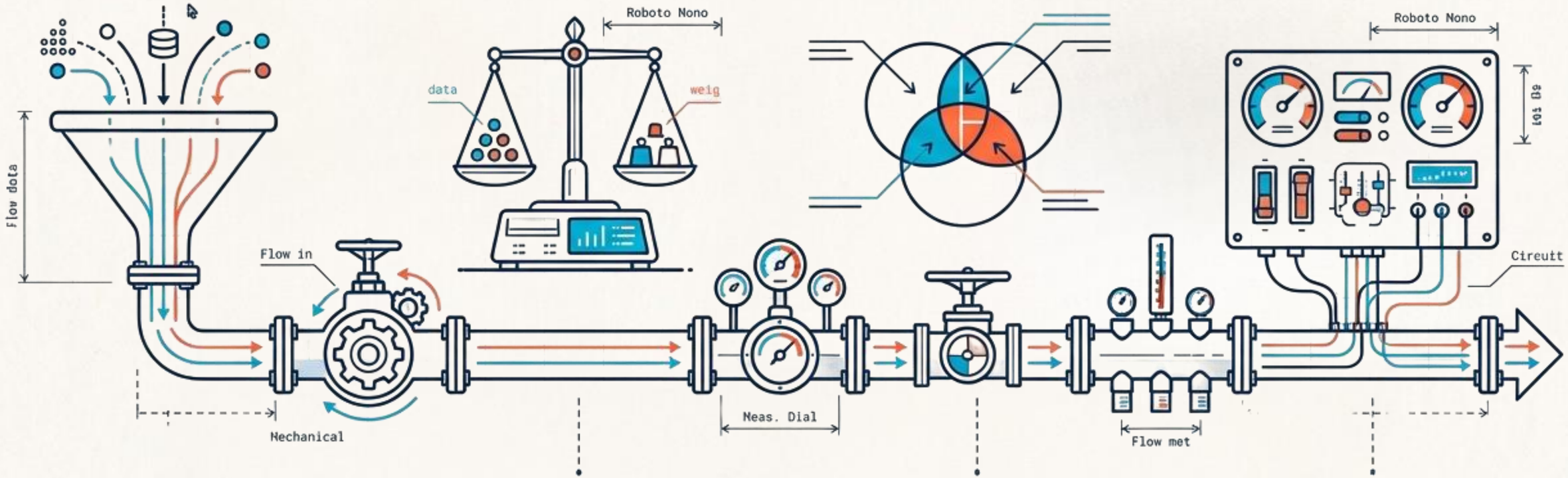
Applying MaxDiff and TURF to resolve CX/UX trade-offs. Bridging qualitative discovery, preference modeling, and technical feasibility to drive revenue through agent behavior.



The portal is a revenue lever, not just a technology initiative



A rigorous, four-phase methodology bridges customer desire with operational reality



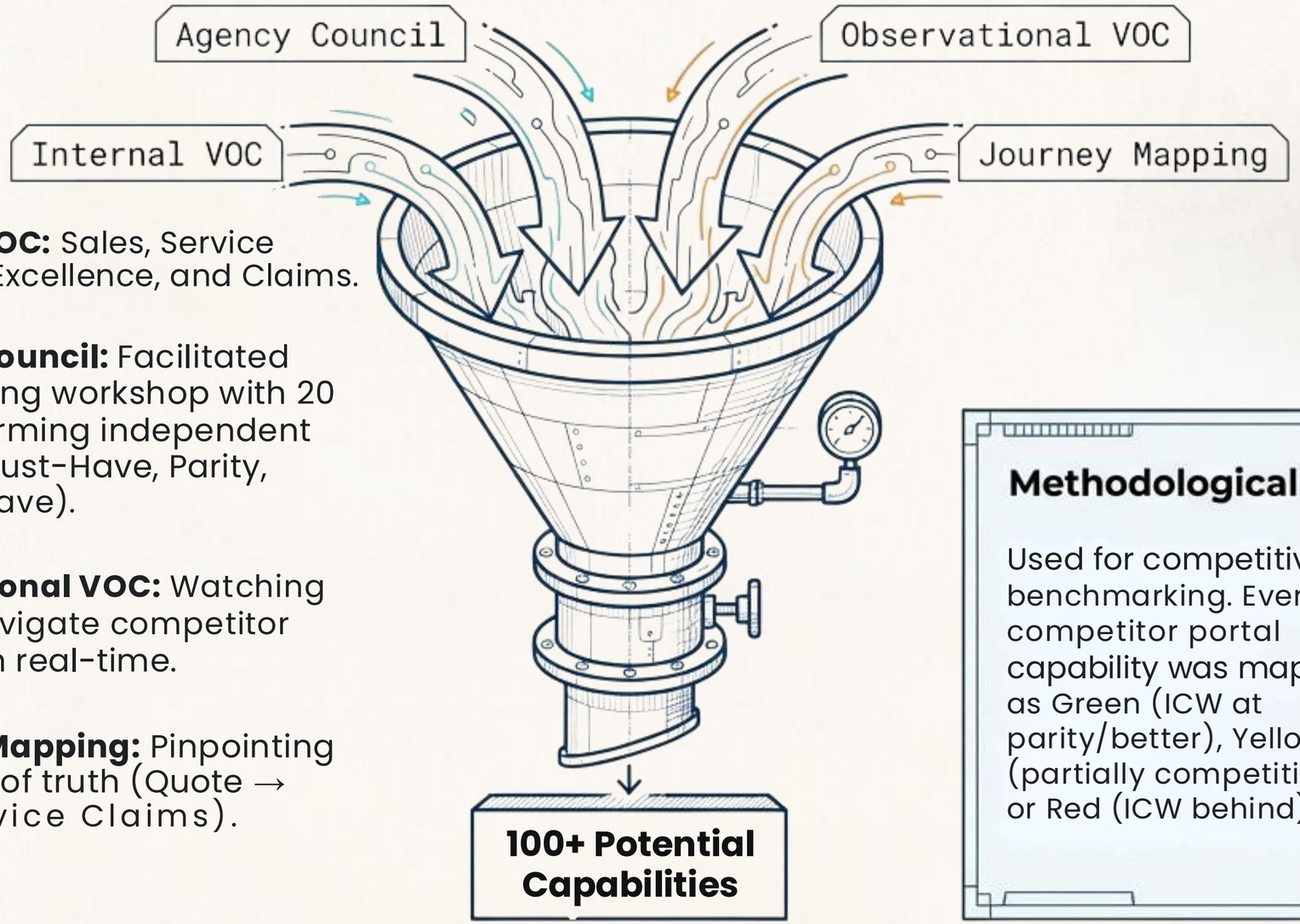
Phase 1: Qualitative Discovery
(Identifying 100+ workflow capabilities)

Phase 2: MaxDiff Modeling
(Quantifying relative preference for 36 attributes)

Phase 3: TURF Optimization
(Identifying optimal feature bundles)

Phase 4: Decision Macro Tool
(Navigating IT constraints in real-time)

Casting a wide net to capture real-world workflow friction



Internal VOC: Sales, Service Center of Excellence, and Claims.

Agency Council: Facilitated card-sorting workshop with 20 top-performing independent agents (Must-Have, Parity, Nice-to-Have).

Observational VOC: Watching agents navigate competitor systems in real-time.

Journey Mapping: Pinpointing moments of truth (Quote → Bind Service Claims).

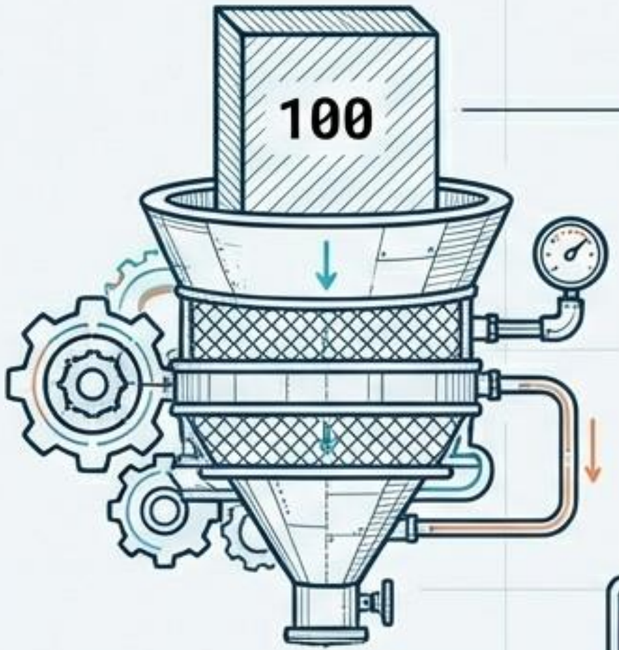
Methodological Callout - The Pugh Matrix

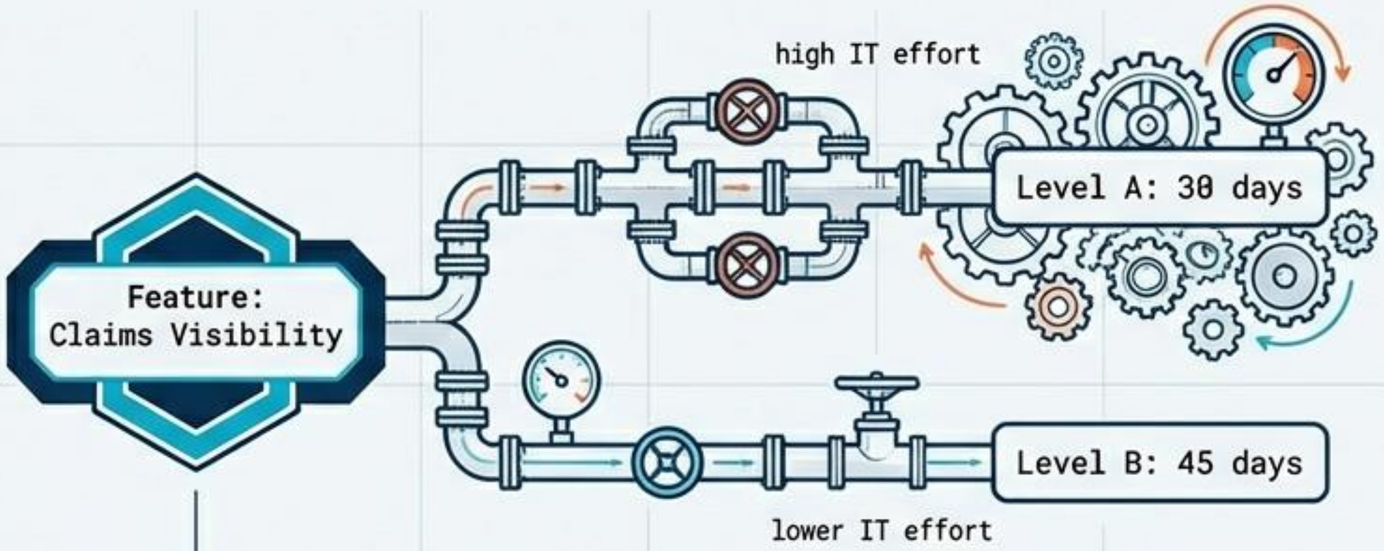
Used for competitive benchmarking. Every competitor portal capability was mapped as Green (ICW at parity/better), Yellow (partially competitive), or Red (ICW behind).

CAPABILITY	ICW	COMPETITOR A	COMPETITOR B
	🟢	🟡	🟡
	🟡	🟢	🔴
	🔴	🟢	🟢
	🟢	🔴	🟡

Translating abstract features into testable attribute levels

The Constraint: MaxDiff models require statistical balance. 100 items is too large; 30-40 is optimal. Through consolidation and feasibility checks, the universe was narrowed to exactly 36 attributes.





Methodological Callout - Features vs. Attribute Levels

Not every capability is simply present or absent. Implementation levels drastically alter IT effort.

Example tested: Claims visibility.

- Level A: Claims data refreshed every 30 days.
- Level B: Claims data refreshed every 45 days.

Because MaxDiff treats each level as a separate item, precise definitions were required before modeling.

Forcing trade-offs: Why 1-to-10 rating scales fail

What is MaxDiff?

Maximum Difference Scaling forces respondents to make trade-off decisions from a rotating subset of attributes, producing far stronger preference discrimination than traditional rating scales.

Best-Worst Scaling Forces Meaningful Trade-Offs

Standard rating scales fail because respondents rate everything as highly important. Best-Worst scaling produces stronger preference discrimination by forcing strict choices.

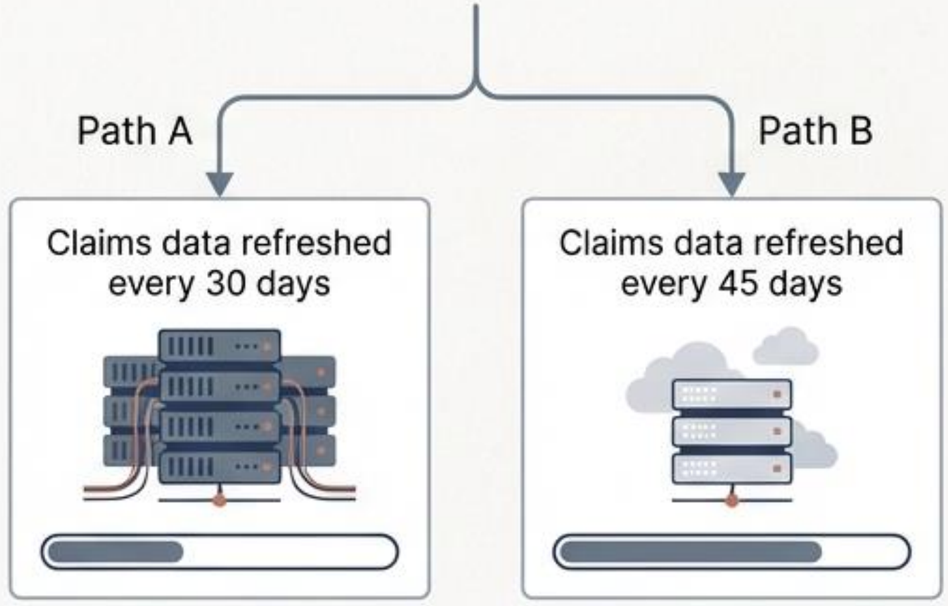
Pro-Tip

The MaxDiff experiment was structured using a **Balanced Incomplete Block Design** (BIBD) to ensure rigorous and unbiased exposure of the 36 items.

Features are rarely binary. Implementation levels alter both value and effort.

Agent Desirability

Technical Feasibility



For the agent, the difference is a slight change in utility. For IT, the difference represents vastly different system integration requirements. Each level must be tested as a separate attribute.

The fatal flaw of simply building the 'Top Ranked" features

Traditional Approach

Feature 1

Feature 2

Feature 3

Feature 4

Optimal Approach

Feature 1

Feature 3

Feature 2

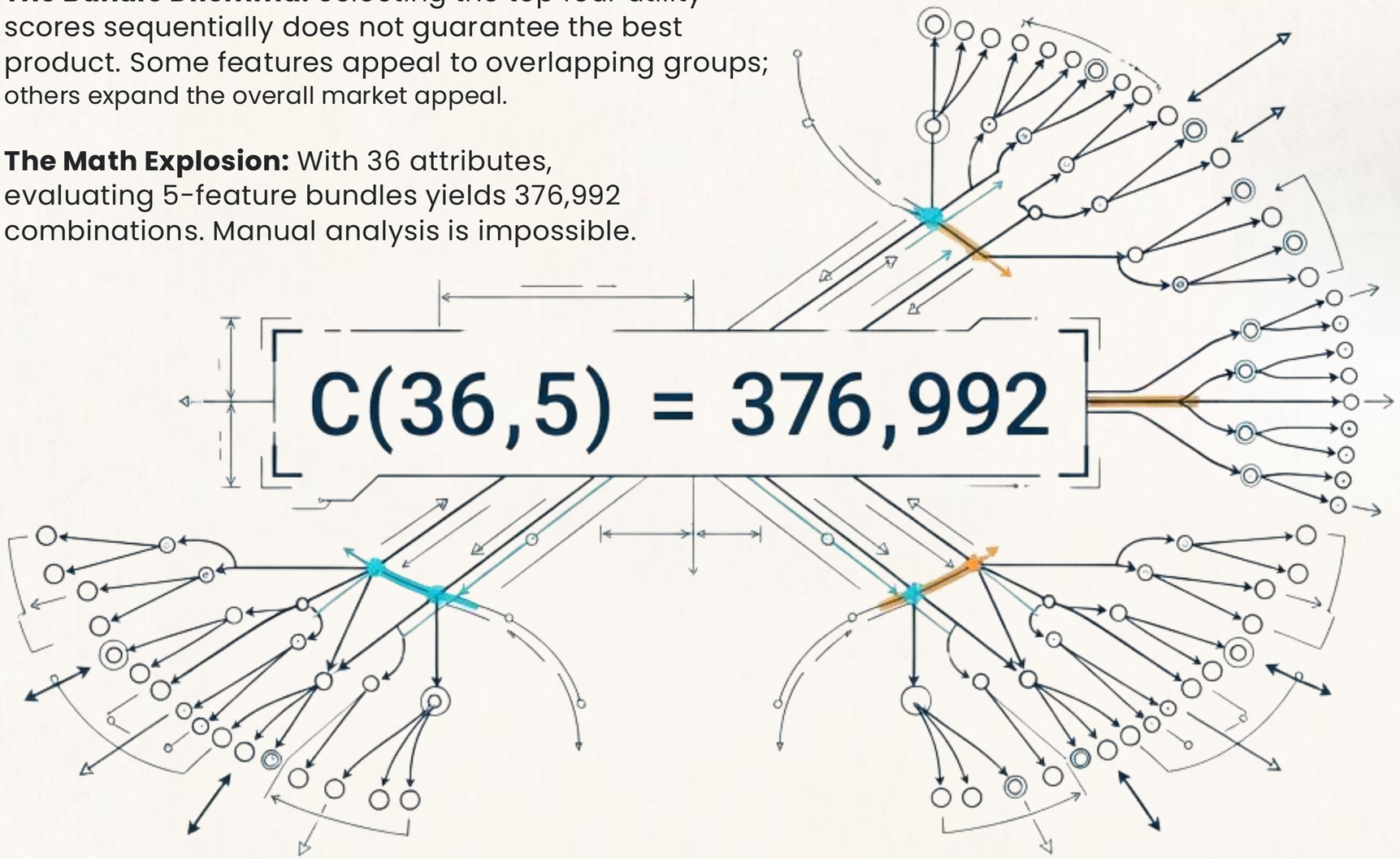
Feature 4

This is where the next phase begins: TURF analysis. Bundling portal attributes layers into desirable “packages”.

Top-ranked individual features rarely make the optimal bundle

The Bundle Dilemma: Selecting the top four utility scores sequentially does not guarantee the best product. Some features appeal to overlapping groups; others expand the overall market appeal.

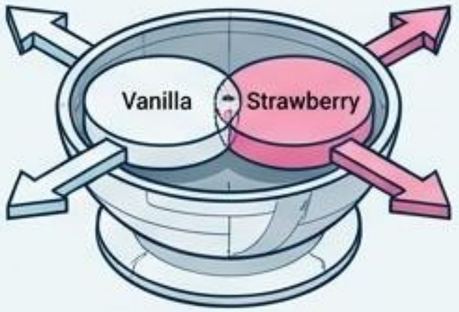
The Math Explosion: With 36 attributes, evaluating 5-feature bundles yields 376,992 combinations. Manual analysis is impossible.



Sidebar: The Ice Cream Dilemma

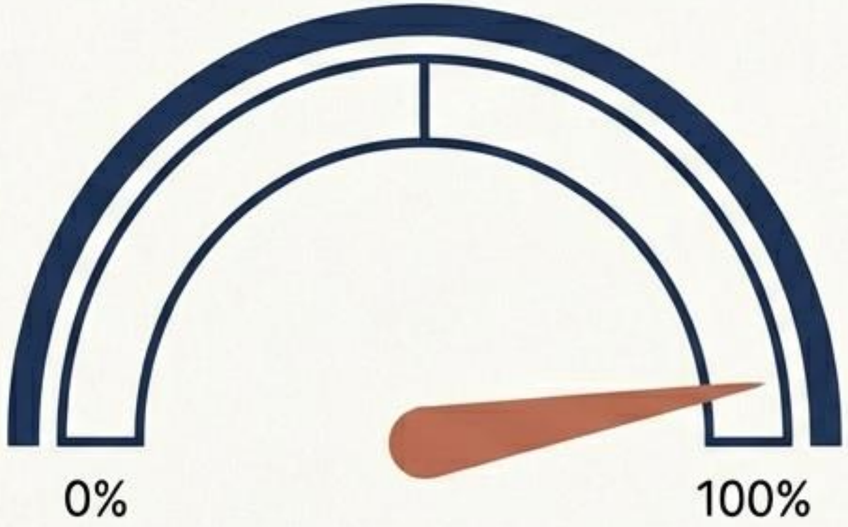
If the top three flavors are Vanilla, Chocolate, and Strawberry, a store limited to two flavors might instinctively pick Vanilla + Chocolate.
However, if Vanilla lovers also eat Chocolate, but Strawberry lovers only eat Strawberry, the optimal assortment to reach the most unique customers is actually Vanilla + Strawberry.

❌ Suboptimal Reach



✅ Optimal Reach

Measuring success requires both Breadth and Depth



Reach: 98%

98% of agents find the feature bundle valuable enough to use the portal.

Frequency: 3x

On average, each agent values at least three features within the delivered bundle.

A portal that reaches 98% of agents but only satisfies one feature need will not drive consistent usage. Ongoing utilization requires a frequency of at least three highly valued capabilities.

The operational roadblock: When development says 'No'

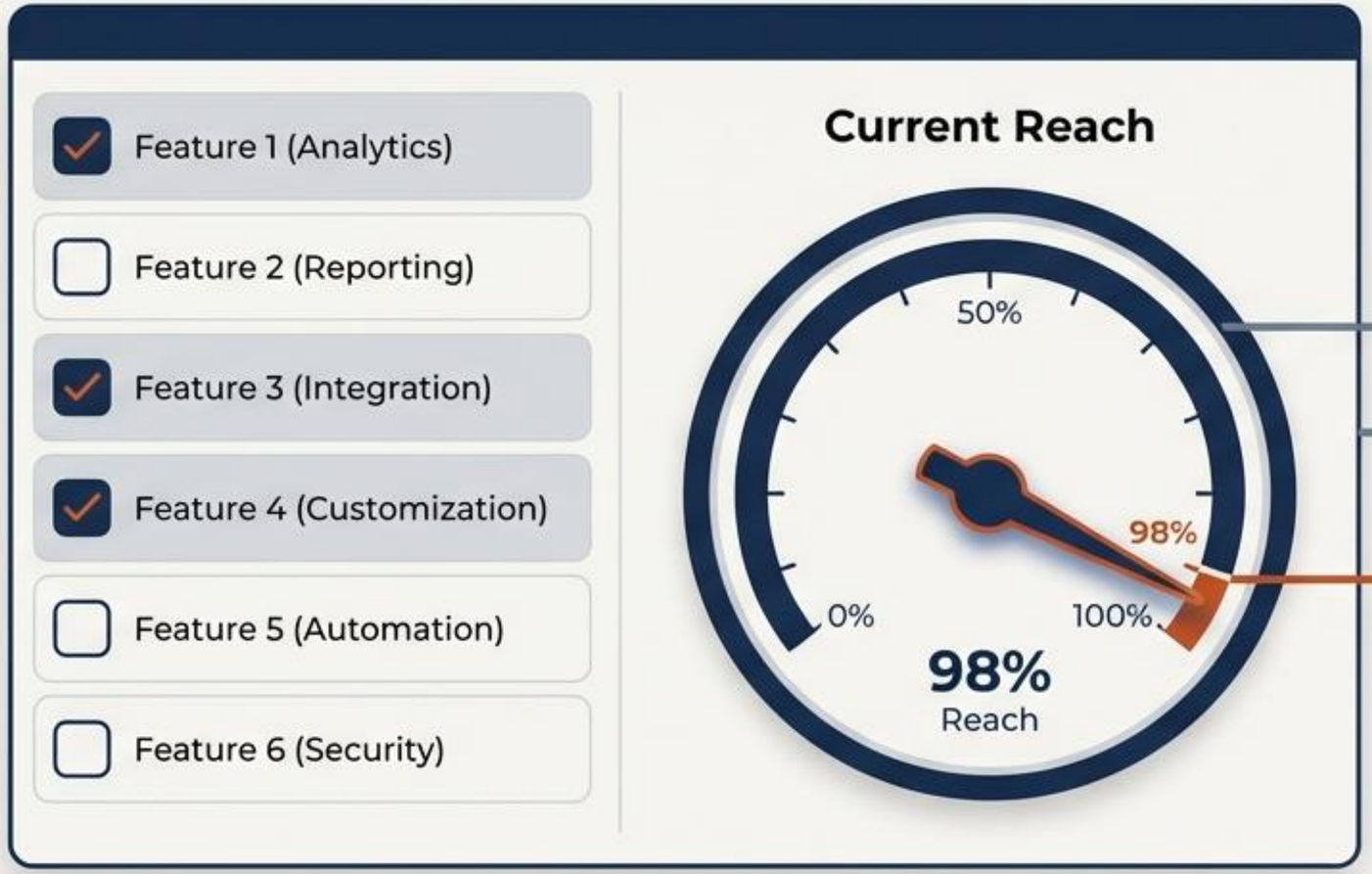
The optimal bundle is identified, but IT realities strike:

- Certain features are technically complex.

- Specific API integrations require longer development cycles.

- Key capabilities from the optimal bundle cannot be delivered in the initial release.

The Macro Decision Tool Bridges Research and IT Reality



Static research dies when IT constraints emerge.

We built a dynamic feature selector with our analytics team to instantly evaluate new combinations.

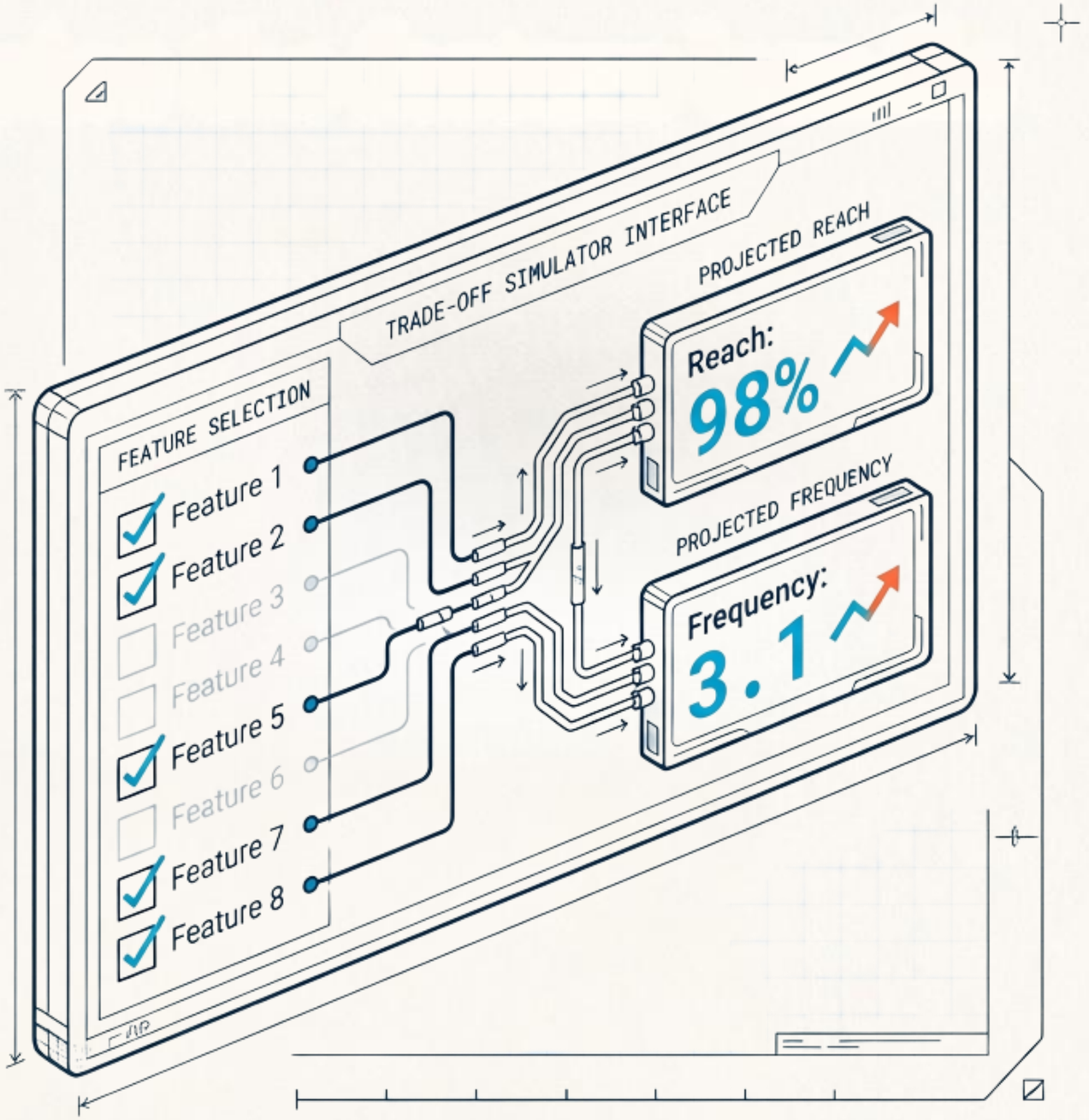
This allowed product teams to negotiate build effort while strictly maintaining the 98% Reach threshold.

Dynamic modeling enables data-driven horse trading

The Decision Macro Tool: Partnering with the data analytics team, the 36 attributes, MaxDiff utilities, and TURF outputs were embedded into a dynamic simulator.

Simulating Trade-Offs: If IT removes highly complex Features 3, 4, and 6, the tool immediately identifies which allternative features must be added to replace them.

The Impact: Transforms research from a static report into an actionable, real-time negotiation tool for cross-functional product teams.



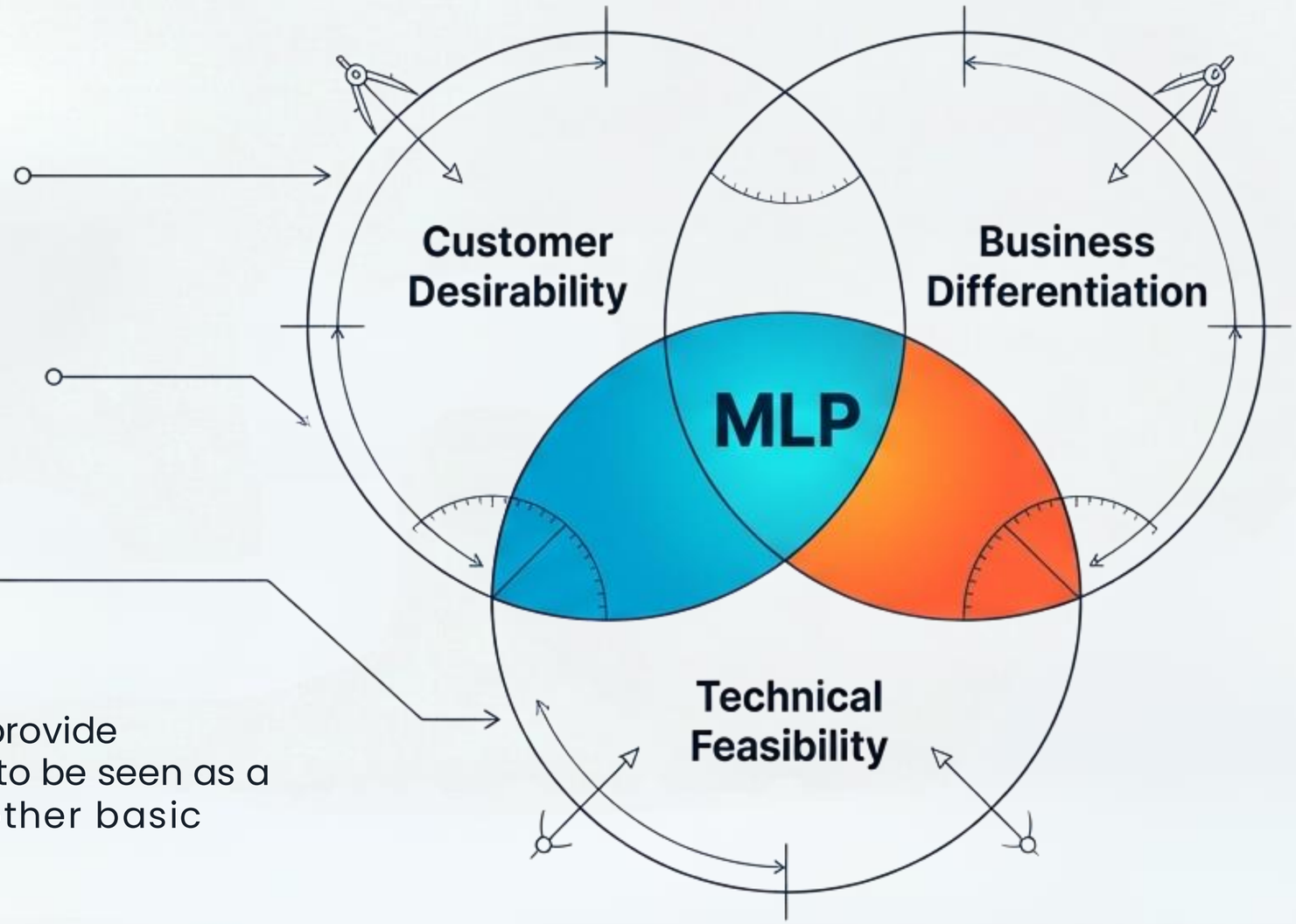
Moving beyond viable to deliver a Minimum Lovable Product

Customer Desirability: What independent agents actually value (Proven by MaxDiff).

Business Differentiation: What makes
ICW Group stand out to drive quote volume (Optimized by TURF).

Technical Feasibility: What IT can realistically build on day one (Navigated by the Macro Tool).

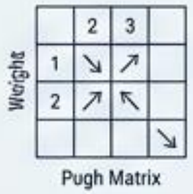
The MLP Philosophy: The portal must provide enough meaningful value on day one to be seen as a genuine differentiator, not just another basic tool.



Turning complex preference data into a practical decision framework

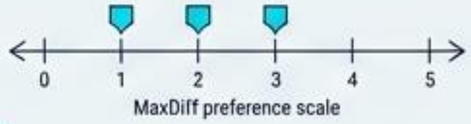
Lesson 1: Attribute generation matters.

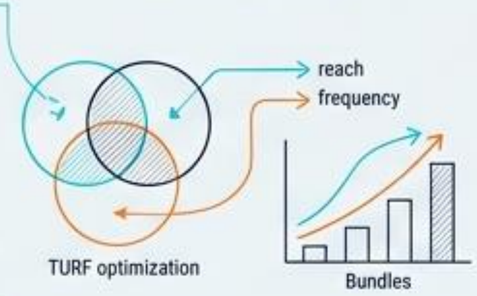
36 MaxDiff items are only as good as the qualitative rigor (Journey Mapping, Pugh Matrices, VOC) used to define them.



Lesson 2: MaxDiff identifies importance; TURF optimizes bundles.

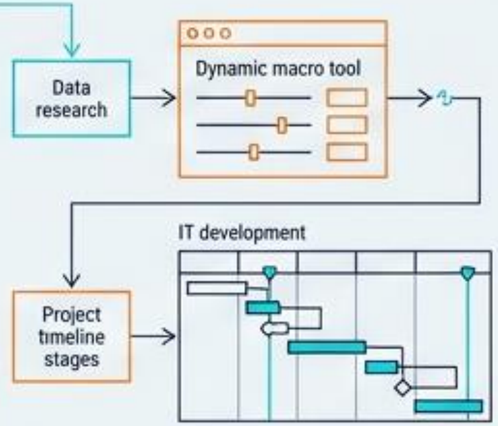
Identifying individual preference is not enough; solving for reach and frequency ensures broad adoption and deep utility.





Lesson 3: Make the data actionable.

A dynamic macro tool bridges the gap between statistical research and the gritty reality of IT development timelines.



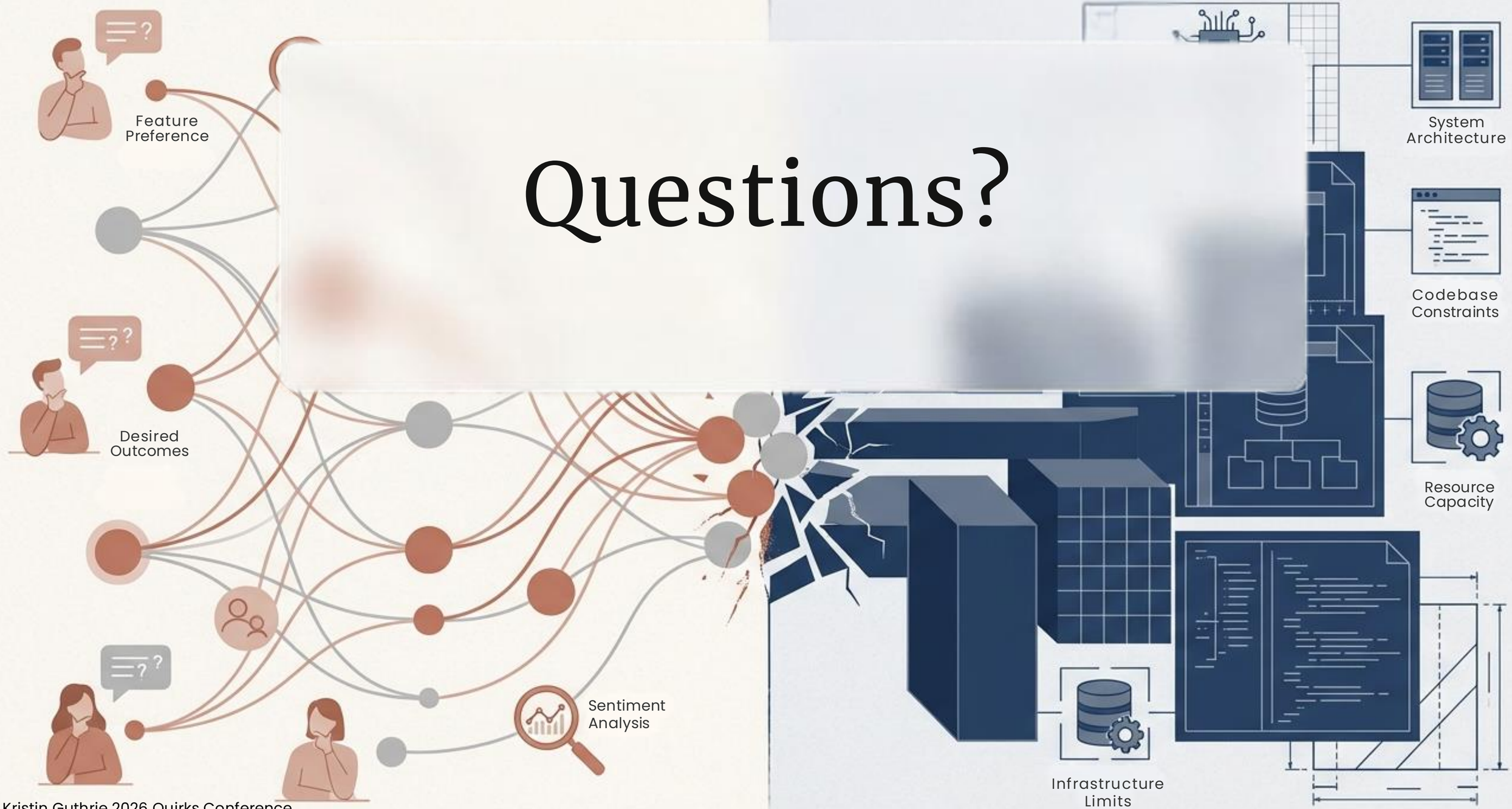
PILLAR 1: QUALITATIVE FOUNDATION

PILLAR 2: QUANTITATIVE OPTIMIZATION

PILLAR 3: OPERATIONAL EXECUTION

STRUCTURAL FOUNDATION: DATA-DRIVEN DECISION MAKING

Questions?


Feature Preference
Desired Outcomes
Sentiment Analysis
System Architecture
Codebase Constraints
Resource Capacity
Infrastructure Limits