

Approve barcode pilot?

EXECUTIVE BRIEF

Northstar Goods should approve a six-week barcode-scanning pilot in its Valparaíso warehouse, with adjustments to address Wi-Fi dead zones and a structured evaluation to confirm error reduction. Baseline data shows 216 errors over 14,400 lines (1.5% error rate) and median pick time of 74 seconds. The pilot cost is USD 7,800 for six pickers. A two-day trial showed 5 errors over 960 lines (0.52% error rate) but median pick time increased to 79 seconds, and two Wi-Fi dead zones were reported. The pilot should proceed with Wi-Fi remediation and clear success metrics.

Decision: Approve barcode pilot?

- Northstar Goods leadership must decide whether to approve a six-week barcode-scanning pilot in the Valparaíso warehouse.
- The pilot would equip six pickers with scanners at an estimated cost of USD 7,800.
- The decision is a go, adjust, or stop recommendation based on evidence from baseline operations and a two-day trial.

DECISION LENS

The decision is a go, adjust, or stop recommendation based on evidence from baseline operations and a two-day trial.

EVIDENCE

S1 / S2 / S3

Baseline: Current picking performance

- Over four weeks, 18 pickers processed 14,400 order lines with 216 documented picking errors.
- Median pick time was 74 seconds per line.
- This yields an error rate of 1.5% and a throughput of 800 lines per week per picker.

DECISION LENS

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EVIDENCE

S1

Trial: Barcode scanning shows promise

- In a two-day trial, six users processed 960 lines with 5 documented picking errors, an error rate of 0.52%.
- Median pick time was 79 seconds, slightly higher than baseline.
- Users reported two Wi-Fi dead zones, and the trial was not randomized.

DECISION LENS

Users reported two Wi-Fi dead zones, and the trial was not randomized.

EVIDENCE

S3

Cost and feasibility: USD 7,800 pilot

- The six-week pilot is estimated at USD 7,800, including scanners, labels, setup, and support.
- The estimate assumes existing Wi-Fi coverage is sufficient, but the trial identified two dead zones.
- This is a low-cost, low-risk investment relative to potential error reduction.

DECISION LENS

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EVIDENCE

S2 / S3

Recommendation: Go with adjustments

- remediate the two Wi-Fi dead zones before launch
- define success metrics (e.g., error rate below 1%, median pick time within 5% of baseline), and
- conduct a mid-pilot review at week three. This balances evidence of error reduction with operational risk.

DECISION LENS

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EVIDENCE

S1 / S2 / S3

Next steps: Launch and evaluate

- remediate Wi-Fi dead zones in week one
- launch the pilot in week two with six pickers
- collect daily error and pick-time data
- conduct a mid-pilot review at week three, and
- deliver a final report at week six with a go/no-go recommendation for full rollout.

DECISION LENS

deliver a final report at week six with a go/no-go recommendation for full rollout.

EVIDENCE

S1 / S2 / S3

Evidence: Key data points

- The evidence base includes three sources: baseline picking performance (S1), the barcode pilot estimate (S2), and the two-day scanner trial (S3).
- Key data points are: baseline error rate 1.5%, trial error rate 0.52%, pilot cost USD 7,800, and two Wi-Fi dead zones identified.

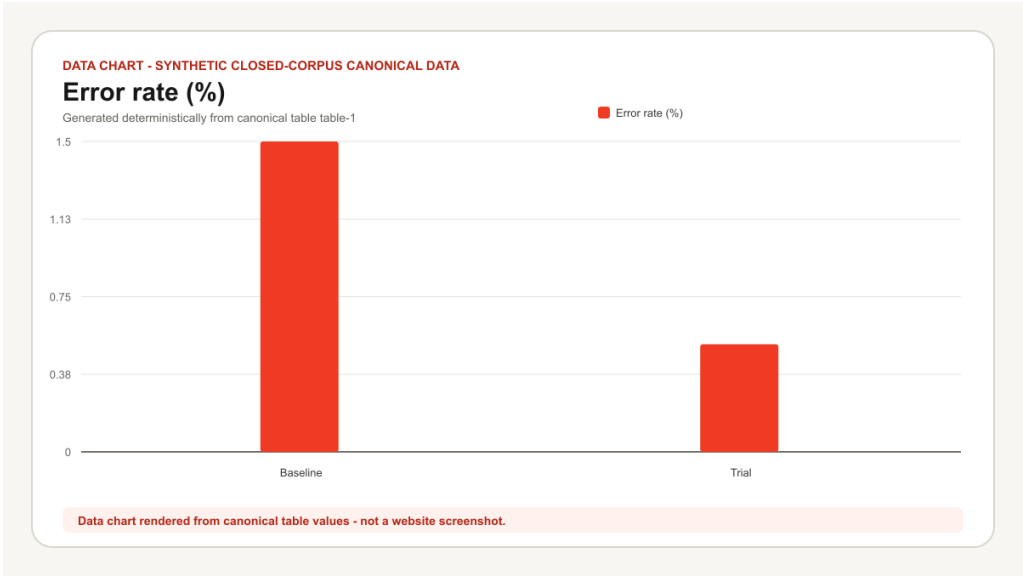
DECISION LENS

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EVIDENCE

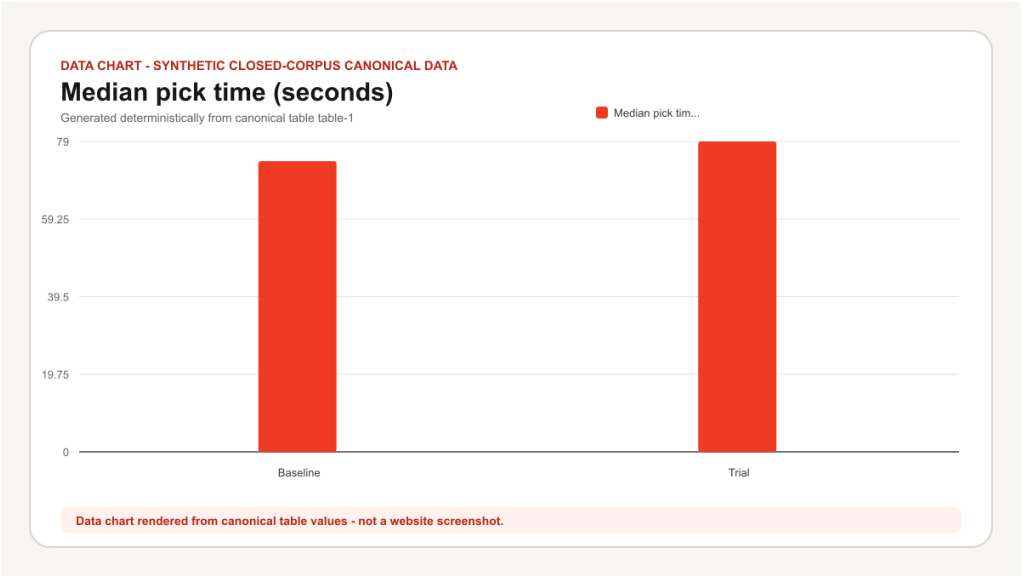
S1 / S2 / S3

Data chart: Error rate (%)



Data chart rendered from canonical table values - not a website screenshot.

Data chart: Median pick time (seconds)



Data chart rendered from canonical table values - not a website screenshot.

Sources

S1 Warehouse picking baseline

<https://northstar.example.test/evidence/picking-baseline>

S2 Barcode pilot estimate

<https://northstar.example.test/evidence/barcode-estimate>

S3 Two-day scanner trial

<https://northstar.example.test/evidence/scanner-trial>