

Weekly Inventory Intelligence Report

GlowLab Beauty Co.
February 24 – March 2, 2025

REPORT DETAILS

Report Period	Feb 24 – Mar 2, 2025
Brand	GlowLab Beauty Co.
Category	Beauty & Personal Care
Active SKUs	42
Data Sources	Shopify + WMS

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Executive Summary

This week, GlowLab's inventory position requires attention on two fronts. Three hero SKUs are within 7–11 days of stockout and need immediate purchase orders. Simultaneously, five SKUs are carrying excess stock beyond 90-day cover, locking up approximately **\$18.4K in working capital**. Reorder action is most time-sensitive ahead of the spring sale window (March 10–17), where demand uplift of 30–45% is projected on high-velocity SKUs.

TOTAL ACTIVE SKUS 42 — 2 new this week	SKUS AT STOCKOUT RISK 3 ▼ vs 1 last week	AVG. DAYS OF COVER 34 days ▼ down 3 days WoW	CAPITAL IN OVERSTOCK \$18.4K ▲ down 2.1K WoW
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Section 1: Inventory Health & Stockout Risk

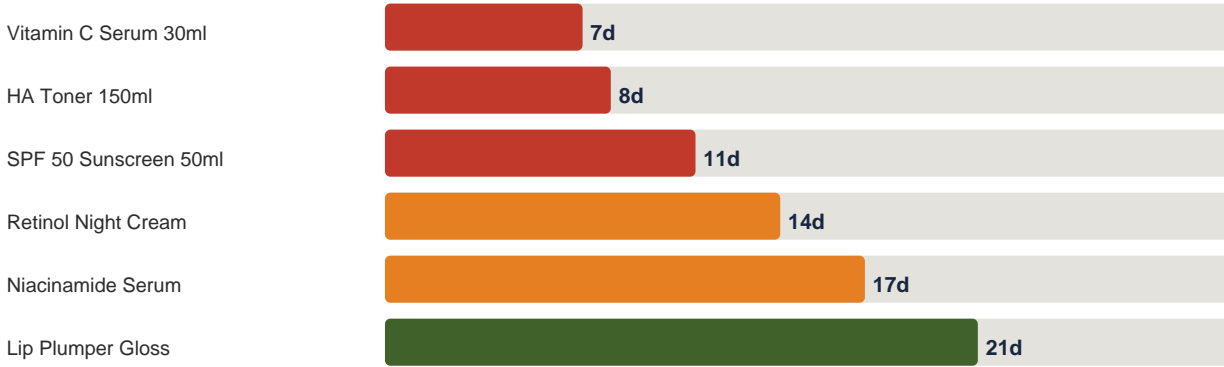
Days of cover is derived from the per-SKU demand forecast, not a trailing average. See Section 6 for detail on how each SKU's forecast is generated.

SKU / Product	Category	Stock On Hand	Forecast Daily Demand	Days of Cover	Status
Vitamin C Brightening Serum 30ml	Serums	248 units	34 u/day	7 days	CRITICAL
Hyaluronic Acid Toner 150ml	Toners	180 units	22 u/day	8 days	CRITICAL
SPF 50 Sunscreen Fluid 50ml	SPF	310 units	29 u/day	11 days	CRITICAL
Retinol Night Cream 50ml	Creams	560 units	18 u/day	14 days	WARNING
Niacinamide Serum 30ml	Serums	720 units	21 u/day	17 days	WARNING
Lip Plumper Gloss 4ml	Lip Care	890 units	14 u/day	21 days	MONITOR

* Forecast daily demand is the output of the best-fit model for each SKU. Details in Section 6.

Vitamin C Brightening Serum has the highest combined urgency this week — 7 days of cover, a spring sale uplift of +38% projected in 10 days, and a lead time of 8 days from LabChem India. This leaves a margin of zero if the PO is not placed today.

Days of Cover — At-Risk SKUs



Red = Critical (<14 days) | Orange = Warning (14–21 days) | Olive = Monitor (21–30 days)

Section 2: Reorder Recommendations

Reorder quantities account for supplier lead time, a 2-week safety stock buffer, and the projected sale uplift window (March 10–17). All PO values are indicative based on last confirmed pricing.

SKU / Product	Supplier	Lead Time	Forecast Demand	Sale Buffer	Suggested PO Qty	Est. PO Value	Action By
Vitamin C Serum 30ml	LabChem India	8 days	950 u	+200 u	1,150 u	\$2.76K	Feb 25
HA Toner 150ml	PureBio Pvt Ltd	6 days	620 u	+120 u	740 u	\$1.33K	Feb 25
SPF 50 Sunscreen 50ml	SunForm Labs	10 days	820 u	+180 u	1,000 u	\$2.20K	Feb 24
Retinol Night Cream 50ml	LabChem India	8 days	480 u	+80 u	560 u	\$1.68K	Mar 1
Niacinamide Serum 30ml	PureBio Pvt Ltd	6 days	580 u	+100 u	680 u	\$1.02K	Mar 3

\$8.99K

All three critical SKUs share LabChem India or PureBio Pvt Ltd as suppliers. Consolidating the Feb 24–25 POs into a single vendor dispatch could reduce freight costs by an estimated \$12,000–\$18,000.

Section 3: Working Capital & Overstock Analysis

SKUs carrying more than 60 days of forecast cover. Excess inventory ties up working capital and increases write-off risk, particularly for formulations with an 18-month shelf life.

<p>TOTAL OVERSTOCK VALUE</p> <p>\$18.4K</p> <p>▲ vs \$20.5K last wk</p>	<p>SKUS > 90 DAY COVER</p> <p>5</p> <p>— no change WoW</p>	<p>ESTIMATED EXPIRY RISK</p> <p>\$3.1K</p> <p>▼ next 90 days</p>	<p>DEAD STOCK (0 SALES 30D)</p> <p>2 SKUs</p> <p>▼ new this week</p>
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SKU / Product	Category	Stock On Hand	Days Cover	Excess Units	Capital Tied Up	Expiry Risk	Recommended Action
Rose Hip Face Oil 30ml	Oils	2,400 u	138 days	1,320 u	\$5.28K	Low	Bundle promo
Makeup Remover Balm 100ml	Cleansers	1,950 u	112 days	950 u	\$3.80K	Medium	D2C email push
Brightening Eye Cream 15ml	Eye Care	1,680 u	104 days	820 u	\$4.10K	High	Flash sale 30% off
Micellar Water 200ml	Cleansers	3,100 u	96 days	680 u	\$2.72K	Low	Bundle with serums
Charcoal Face Mask 75ml	Masks	2,200 u	91 days	560 u	\$2.52K	Medium	Influencer gifting

Overstock Capital by Category



- Cleansers: \$6.5K
- Oils: \$5.3K
- Eye Care: \$4.1K
- Masks: \$2.5K

Brightening Eye Cream 15ml carries the highest combined risk: high expiry classification, \$4.1K locked up, and a demand trough projected through March. A 10-day flash sale at 30% off is recommended to move approximately 500 units before the trough deepens.

Section 4: Priority Action Checklist — This Week

URGENT	Place PO for SPF 50 Sunscreen 50ml (1,000 units) with SunForm Labs	Feb 24
URGENT	Place PO for Vitamin C Serum + HA Toner with LabChem / PureBio	Feb 25
HIGH	Initiate flash sale for Brightening Eye Cream — 30% off, 10-day window	Feb 26
HIGH	Set up D2C email push for Makeup Remover Balm overstock clearance	Feb 27
MEDIUM	Design cross-sell bundle: Rose Hip Face Oil + Vitamin C Serum	Mar 1
MEDIUM	Brief influencer team on Charcoal Mask gifting programme	Mar 3
LOW	Review dead-stock SKUs and initiate write-off or liquidation process	Mar 5

Section 5: Forecasting Methodology

For each SKU, a set of candidate forecasting models is evaluated every cycle. Each model is trained on in-sample data and scored against a held-out window it has not seen. The model with the best combined score on three criteria — holdout accuracy, systematic bias, and forecast stability — is selected as the active model for that SKU. The winner can change between cycles as new actuals arrive.

5.1 Model Selection Criteria

<p>Holdout MAE</p> <p>Mean Absolute Error measured on a held-out period excluded from model training. This is the primary accuracy signal.</p>	<p>Bias</p> <p>Systematic tendency to over- or under-forecast. A model with low MAE but high bias will drift in one direction over time.</p>	<p>Stability</p> <p>Consistency of the forecast across re-estimation cycles. An unstable model produces erratic signals that are difficult to act on.</p>
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5.2 Model Scorecard — Vitamin C Brightening Serum 30ml

Example showing all candidate models evaluated this cycle for one SKU.

Model	MAE (holdout)	Bias	Stability	Status
SARIMA WINNER	14.2 units	Low	High	Selected
Holt-Winters	18.7 units	Low	Med	Evaluated
Moving Avg.	22.4 units	Med	Low	Evaluated
Prophet	19.1 units	Med	Med	Evaluated
Regression	24.8 units	High	Low	Evaluated

SARIMA was selected for this SKU. Its holdout MAE of 14.2 units represents a 37% reduction in error vs. a naive linear forecast (22.4 units MAE) on the same holdout window.

5.3 Demand Shape Classification Across Catalog

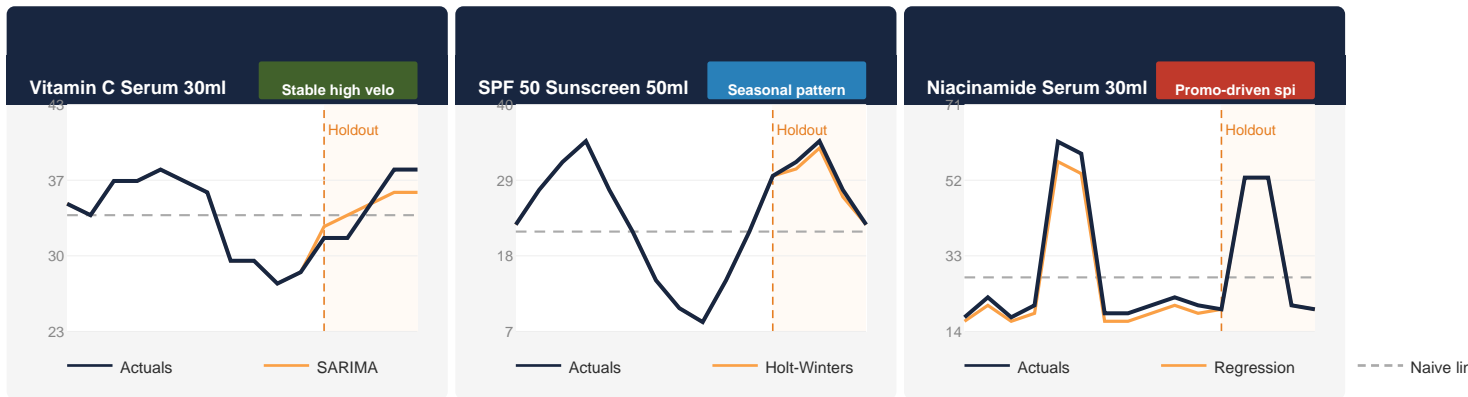
Each SKU is classified by demand shape at the start of each cycle. This classification determines the candidate model set evaluated in the tournament. The table below shows the classification and model selection outcome for active SKUs this cycle.

SKU	Demand Shape	Winner Model	MAE (Winner)	MAE (Linear)	Accuracy Lift
Vitamin C Serum 30ml	Stable high velocity	SARIMA	14.2	22.4	+37%
Hyaluronic Acid Toner	Stable high velocity	SARIMA	9.8	14.6	+33%
SPF 50 Sunscreen 50ml	Seasonal pattern	Holt-Winters	12.1	21.8	+44%
Retinol Night Cream	Stable high velocity	SARIMA	7.4	10.2	+27%
Niacinamide Serum 30ml	Promo-driven spikes	Regression	11.3	19.7	+43%
Rose Hip Face Oil 30ml	Intermittent long tail	Croston	6.2	9.8	+37%
Brightening Eye Cream	Seasonal pattern	Holt-Winters	8.9	13.2	+33%
Charcoal Face Mask 75ml	Promo-driven spikes	Regression	10.4	16.8	+38%

Accuracy Lift = % reduction in MAE of the selected model vs. a naive linear forecast on the same holdout window.

5.4 Forecast vs. Actuals — Three SKU Examples

Actuals vs. the selected model vs. a naive linear forecast across the in-sample and holdout periods. Shaded region is the holdout window used for model selection.



Across the 42 active SKUs this cycle, the average MAE reduction of the selected model vs. a naive linear forecast is 36%. The improvement is largest on seasonal and promo-sensitive SKUs (40–44%), where demand is most non-linear.

Report prepared on March 2, 2025. Data sourced from Shopify + WMS. Next report: March 9, 2025. For questions, contact your Inventory Logiq account manager.