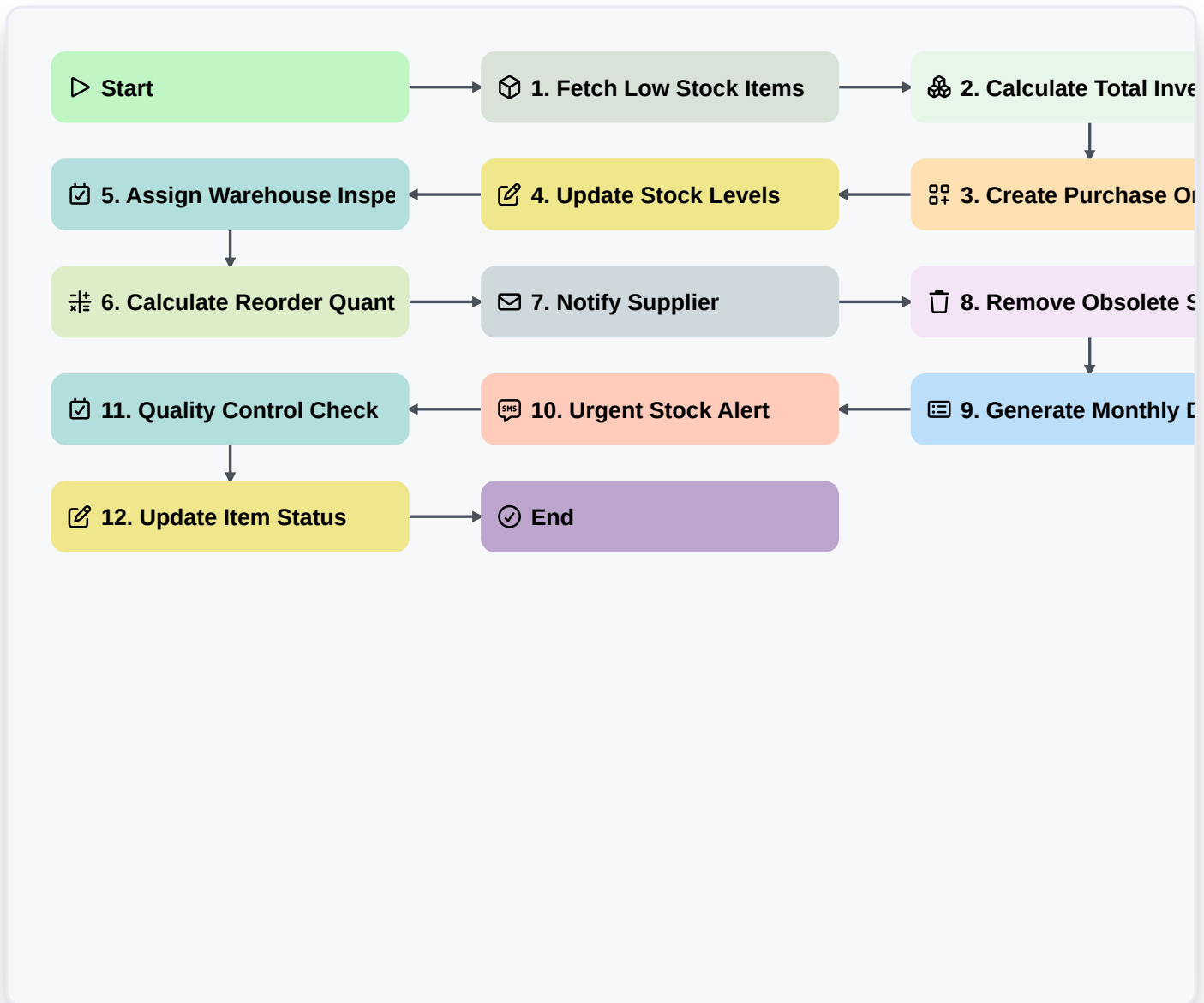


Inventory Management Workflow



▷ Start

Start of the Workflow/Process.

📦 1. Fetch Low Stock Items

Retrieve all inventory entries where current stock level is below the defined reorder point.

🧮 2. Calculate Total Inventory Value

Sum the product of (unit_price * quantity_on_hand) for all items in the warehouse.

🛒 3. Create Purchase Order

Generate a new entry in the Purchase Orders data model to initiate replenishment.

✍️ 4. Update Stock Levels

Increment or decrement the quantity_on_hand field in the Inventory data model upon goods receipt.

📅 5. Assign Warehouse Inspection

Create a task for the Warehouse Manager to perform a physical cycle count of specific items.

🔢 6. Calculate Reorder Quantity

Calculate the required order amount using the formula: $(\text{Lead_Time_Demand} + \text{Safety_Stock}) - \text{Current_Stock}$.



✉ **7. Notify Supplier**

Send an automated email to the vendor's contact address with the details of the new Purchase Order.

🗑 **8. Remove Obsolete SKU**

Delete inventory entries for items that have been flagged as discontinued and have zero stock.

📄 **9. Generate Monthly Discrepancy Report**

Create a report comparing physical count results against system records to identify shrinkage.

📱 **10. Urgent Stock Alert**

Send an SMS notification to the Procurement Officer when a high-priority item hits zero stock.

📅 **11. Quality Control Check**

Create a task for the QA specialist to inspect incoming goods for damages.

✎ **12. Update Item Status**

Change the status of an item from 'Available' to 'Damaged' or 'Reserved'.

🏁 **End**

End of the Workflow/Process.