Quantity Available Analyzer & Trace

Purpose of this document

The purpose of this document is to describe the usage of the Quantity Available Analyzer and the Quantity Available Trace process.

Ceres Object release 5.00.00 is required for the functionality described in this document.

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Quantity Available Analyzer

The available analyzer is designed as a non-invasive toolkit to be used for the purpose of recording metrics related to the quantity available calculation. The toolkit records the processing time for calculation operations at the function, function task, and overall calculation level. The toolkit provides for recording this information as a standalone run (not monitoring of batch processes but rather monitoring of a single quantity available calculation process).

Using the Tool

The performance analyzer is available by navigating: Finance Company → Departments → Administration → Application Tools → Qty. Available Analyzer.
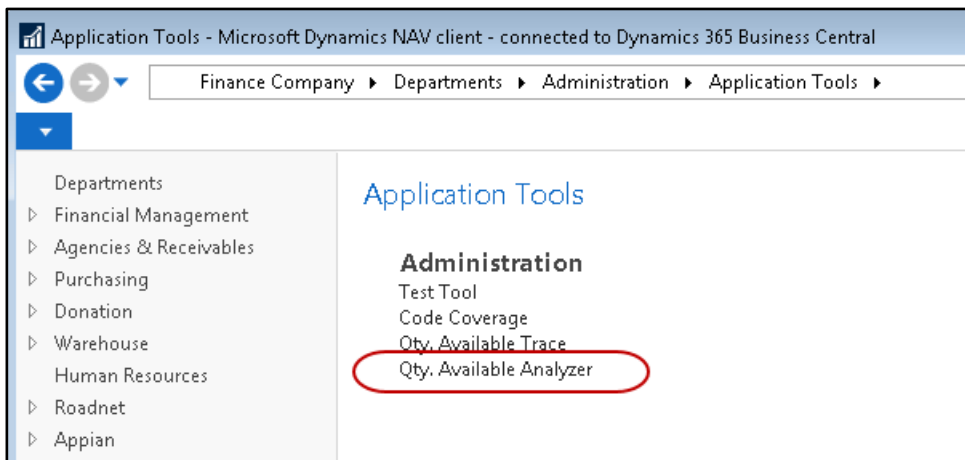
Provided the information needed for the tool to perform the analysis.
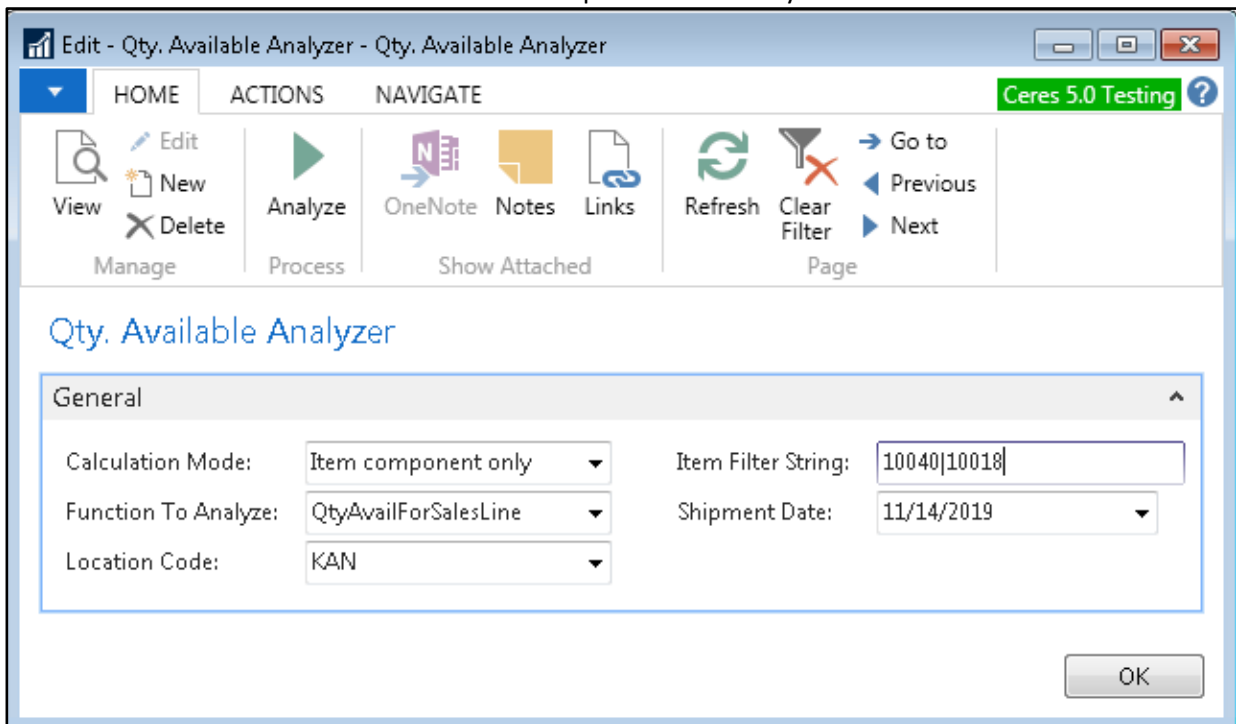
Calculation Mode: Select the mode for the analysis run. The Item component only mode will simulate the quantity available calculation where only an item number has been provided on an agency order line. The All calculation components mode will simulate the quantity available calculation in turn where item number, pallet and/or lot, bin, zone, and quantity have been provided on an agency order line.

Function To Analyze: Select the function for the analysis run. Note that as of the release of Ceres 5.0, only the QtyAvailForSalesLine is available.

**Location Code:** Select the location for the analysis run.

Item Filter String: Specify the item or items to be analyzed. Note that you can provide a single item or multiple items (separated by the pipe '|' symbol). Alternatively, you can leave this filter blank to perform the analysis for all items.

Shipment Date: Specify the shipment date for the analysis run.

Once you have provided all of the needed information, execute the Analyze action. Ceres will perform the analysis on the include item(s) at the specified location. When complete, the dialog shown below will be displayed.
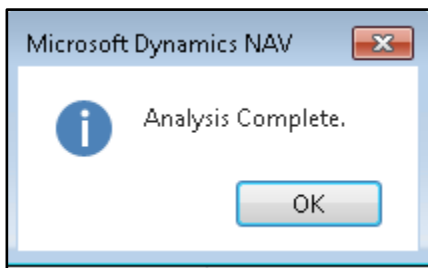
You can then navigate to the ledger entries that were created. Select the Ledger Entries action on the Navigate FastTab.
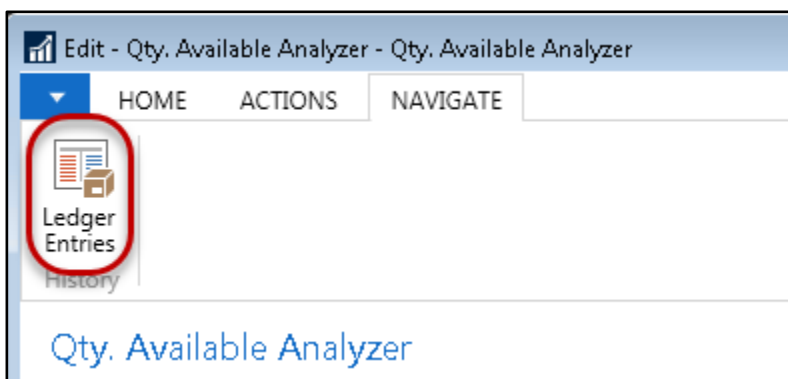
Information about the analysis run can be viewed on the ledger.

Calculation Mode: The mode that was used for the analysis run.

Item No: The item that was used for the analysis run.

Item Description: The description of the item that was used for the analysis run.

Run Date: The date the analysis was run.

Run Time: The time the analysis was run.

Database Name: The name of the database for which the analysis was run.

No. of Open ILE: The count of open Item Ledger Entries that were recorded as supply for the analysis item and location.

Lowest ILE Entry No: The lowest entry number of open Item Ledger Entries that were recorded as supply for the analysis item and location.

Highest ILE Entry No: The highest entry number of open Item Ledger Entries that were recorded as supply for the analysis item and location.

No. of Whse Entry: The count of Warehouse Entries for the analysis item and location.

Lowest Whse Entry No: The lowest entry number of Warehouse Entries that were recorded for the analysis item and location.

Highest Whse Entry No: The highest entry number of Warehouse Entries that were recorded for the analysis item and location.

No of Bins: The count of Bin records for the analysis location.

No of Bin Contents: The count of Bin Content records related to the analysis item and location.

No of Bin Content Buffered: The count of viable bins that were used in the quantity available calculation (e.g. the number bins that contain supply).

No of Sales Lines: The count of agency order document lines related to the analysis item and location.

CalcInventory Duration: The duration of the Inventory calculation. The inventory calculation is preliminary check to determine whether there is any inventory under roof for the analysis item and location.

BufferAllLotPallet Duration: The duration required to identify and record all viable supply layers (Item Ledger Entries) for the analysis item, location, and shipment date. This component involves an iteration of the Item Ledger Entry table to record open, positive, layers for the item and location having a lot consume by date greater than or equal to the shipment date.

BufferBinContent Duration: The duration required to correlate viable supply to its location in the warehouse (e.g. Bin).

BufferOtherThisLot Duration: The duration required to apply demand to the correlated supply.

CalcQtyInBin Duration: This duration is a subset of the BufferOtherThisLot Duration and indicates the duration required to calculation the quantity residing in each of the bins for the correlated supply.

QtyAvailable Duration: The duration required to calculate the availability of the analysis item, location, and shipment date.

Total Duration: The total run time for the analysis.

Run Identifier: A system controlled value that identifies all of the ledger entries created for a given run.

Note: The "Delete All Entries" action on the Actions FastTab can be used to purge Qty. Avail. Analyzer Ledger data.

Supporting functions have been provided to identify items by specific attributes.
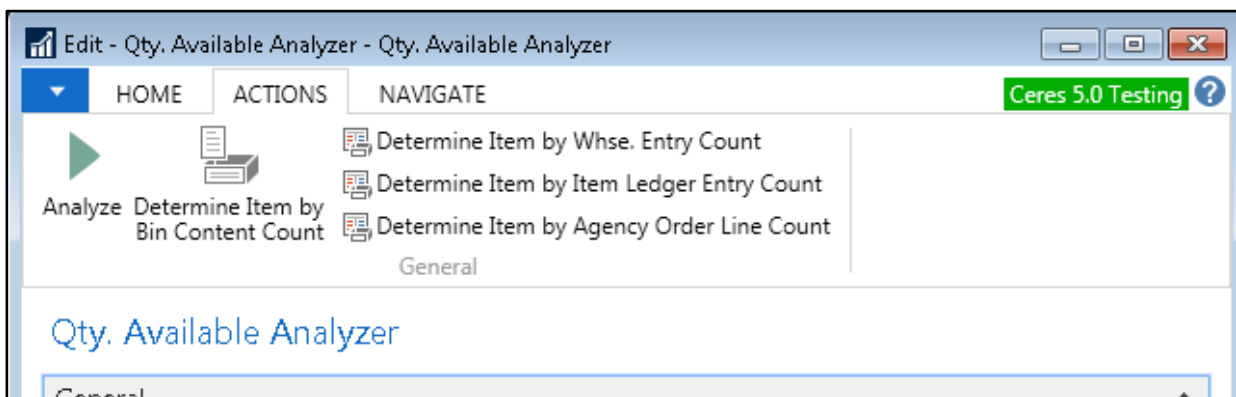
Use the actions shown above to identify the item / location having the highest number of Bin Contents, related warehouse entries, related item ledger entries, or related agency order document lines.

Quantity Available Trace

The Quantity Available Trace is designed as a non-invasive toolkit to be used for the purpose of Identifying the quantity available based on provided filter criteria

Using the Tool

The performance analyzer is available by navigating: Finance Company → Departments → Administration → Application Tools → Qty. Available Trace.
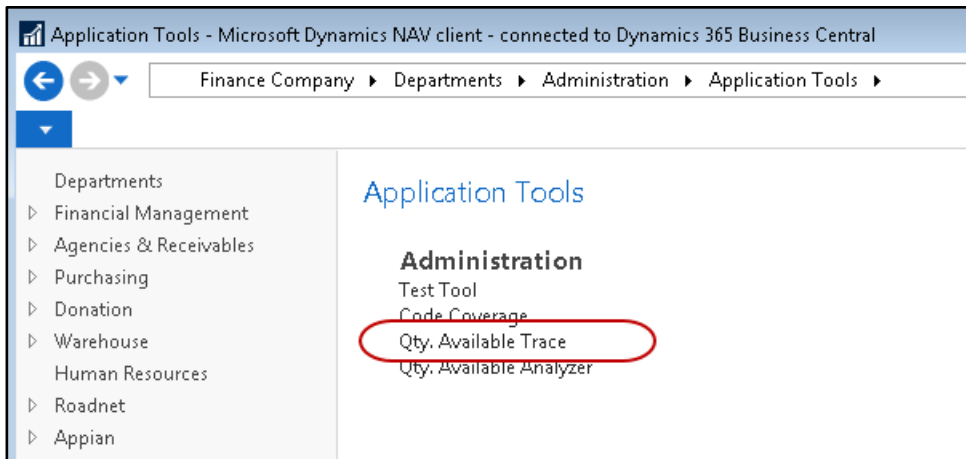
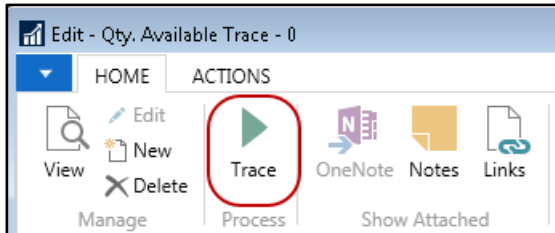Provided the information needed for the tool to perform the analysis.
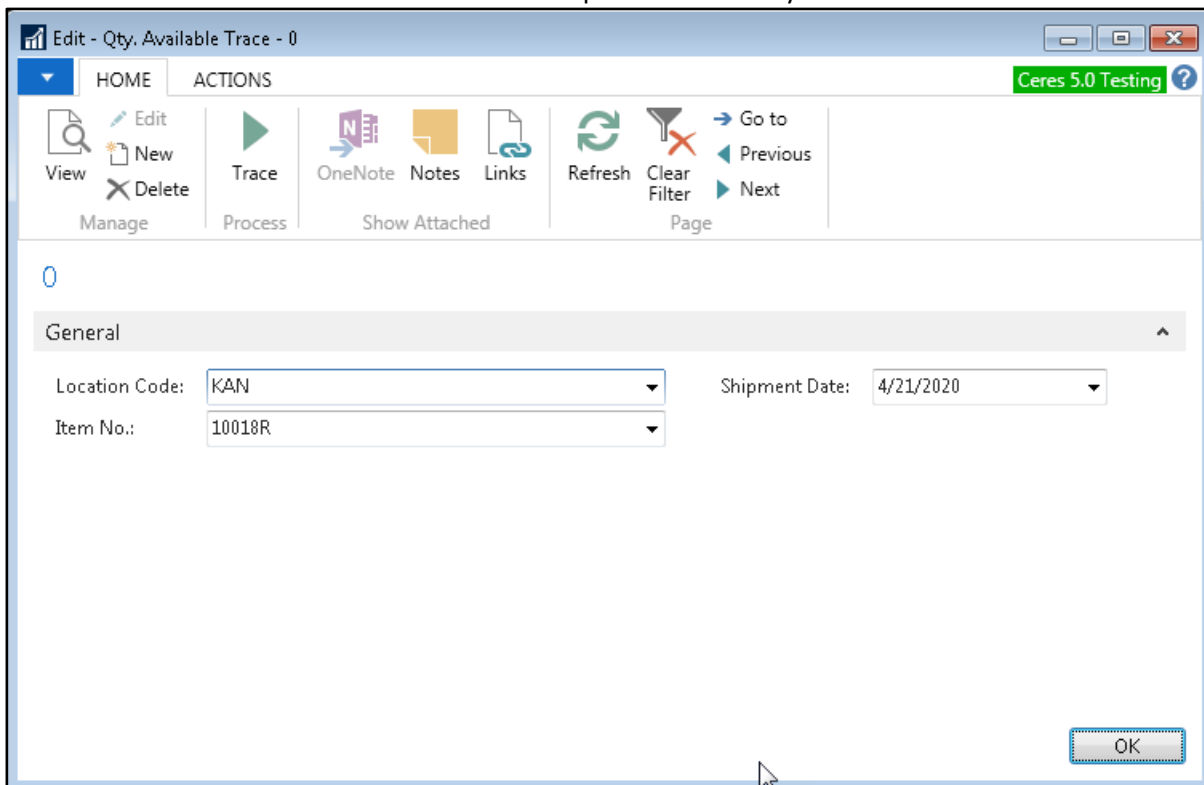
Location Code: Enter the Location Code to be traced.

Item No.: Enter the item number of the product to be traced.

Shipment Date: Enter the shipment date for the trace to determine shipment demand up to and including this date.

Start the trace process by selecting Home → Process → Trace.

The resulting Output will be an Excel Document as shown here.

	A	B	C	D	E	F	G
1	Location Code	KAN					
2	Item No.	10018R					
3	Shipment Date	04/21/20					
4							
5	Pallet No.	Lot No.	Bin Code	Lot Consume by Date	Quantity	Demand Qty.	Quantity Available
6					0	8	-8
7		Agency Order	No.=AO-01236 ,Line No.=20000			2	
8		Agency Order	No.=AO-01311 ,Line No.=10000			0	
9		Item Journal	No.=SHORTS ,Line No.=20000			6	
10							
11	1305-05108	LOT-04172	01-103-B	12/31/9999	100	0	100
12		Agency Order	No.=AO-01257 ,Line No.=20000			0	
13							
14	1305-05196	LOT-04237	04-117-C	12/31/9999	100	0	100
15		Whse. Wkst. Line	No.=WAP-KAN1 ,Line No.=10000			0	
16							
17	1305-05197	LOT-04237	04-119-C	12/31/9999	100	0	100
18	1305-05198	LOT-04237	01-101-A	12/31/9999	100	0	100
19	1305-05199	LOT-04237	01-101-A	12/31/9999	100	0	100
20	1305-05200	LOT-04237	01-101-A	12/31/9999	100	0	100
21	1305-05264	LOT-04278	04-121-A	12/31/9999	26	5	21
22		Invt. Pick	No.=IPD-02776 ,Line No.=10000			5	
23		Agency Order	No.=AO-01309 ,Line No.=10000			0	
24							
25	1305-05266	LOT-04278	01-123-C	12/31/9999	50	0	50
26							
27	Totals				676	13	663
28							