

# PipeChain Release Notes 4.7.0

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# **1 WELCOME**

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PipeChain is a software system that automates the flow of goods between companies, in production, between production and sales within a company.

Website: [www.pipechain.com](http://www.pipechain.com)

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## **NOTICE**

Information in this document is subject to change without notice.

## **2      UPGRADE TO VERSION 4.7.0**

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Here are actions for what to do before installation of PipeChain 4.7.0. Document describing how to install PipeChain 4.7.0 can be found at Customer login at [www.pipechain.com](http://www.pipechain.com) - [Flow on demand](#)

### **2.1      Actions before upgrading to PipeChain 4.7.0**

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Before upgrading to PipeChain 4.7.0 from a previous version than 4.6, please follow the instructions in release notes for all previous releases of PipeChain that you need to check. See [www.pipechain.com](http://www.pipechain.com) at Customer login for earlier release notes.

PipeChain Analyzer 4.7.0 does NOT support SQL Server 2000. SQL Server 2005 or SQL Server 2008 is required.

## **3 RELEASE NOTES PIPECHAIN 4.7.0**

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Release notes is a list of all new functions made in PipeChain 4.7.0. The list also includes all new functions and corrections delivered in service packs in PipeChain 4.6.0.

Please notice that this list is not updated after the release date of 4.7.0. Any new service pack in PipeChain 4.6.0 created after the release date of 4.7.0 is not included but can be found at [www.pipechain.com](http://www.pipechain.com), Customer login/Documentation/4.6.0/Service Pack Notes

### **3.1 New functions and improvements in 4.7.0**

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#### **3.1.1. Analyzer: Changes to Dimensions**

Product dimension:

Products are primarily fetched to PipeChain Analyzer from the product definitions (Own Bucket, Customer Bucket). Products are secondarily fetched from Finished Inbound or Outbound deliveries.

From now on, products are also fetched from unfinished deliveries. This is necessary since Analyzer may save deliveries at shipment time.

Business dimensions:

The two business dimensions ("per Site" vs "with Sites") are separated. The old solution did not guarantee unambiguous attribute dependencies. This could (at least in theory) cause computational errors.

Time dimensions:

A Year Of Week attribute is introduced. The two time dimensions ("Week" vs "Month") are separated since YearOfWeek may differ from YearOfMonth.

A sorting error for months is fixed.

Delivery Id and Delivery Note dimensions:

The Site level is removed. Due to this, the auto-grouping level now works correctly.

A Delivery Key level (at the bottom) is introduced so that drilling can always reach a single delivery record. This enables several measures (e.g. Reception Time) which are only visible for a single record.

PipeChain Order, Purchase Order and Sales Order dimensions:

Keys for intermediate levels (e.g. Order line) are made unique. They did not work correctly before.

Site level is removed and replaced with an auto-group level. Site (or any other dimension attribute) can still be used as filter.

A Delivery Key level (at the bottom) is introduced so that drilling can always reach a single delivery record. This enables several measures (e.g. Reception Time) which are only visible for a single record.

Delivery Responsibility dimension:

This is a new dimension. It is useful if your (or your suppliers') Delivery Responsibility can be either "until Shipment" or "Until Reception".

### 3.1.2. Analyzer: Changes to Cubes

Event cube, FlowModelDay Cube and FlowModelWeek cube:

A total row count is added.

DataExch cube:

Successful/unsuccessful counts are removed. A total row count is added.

Delivery cube:

Depending on the Partner Agreement/Delivery Responsibility setting, a delivery may be moved to the Analyzer when it has passed its scheduled shipment date (in addition to when it becomes "Finished").

All old Delivery Precision measures are removed, and replaced with one single Delivery Precision measure. The DeliveryResponsibility attribute controls whether Shipment or Reception attributes are used.

If a delivery record lacks Shipment or Reception, it is still "counted" (as erroneous).

Several presentation consistency flaws have been fixed.

Inventory cube:

No change.

### 3.1.3. Analyzer: Performance aspects

Aggregation (pre-computation) is introduced for the Inventory cube. This may give a major performance boost to the cube, but it may also increase cube processing time and cube size on disk. The aggregation is NOT possible to parameterize.

An AnalyzerProperties attribute is added for each cube:

- Limit\_Years\_Inventory
- Limit\_Years\_Shipments
- Limit\_Years\_FlowModelPrecisionDay
- Limit\_Years\_FlowModelPrecisionWeek
- Limit\_Years\_Event
- Limit\_Years\_DataExchange

It limits (no of years excluding current year) the amount of data processed by the cube. Default is unlimited (1000 years). The setting apply to ALL PipeChain Sites, since Cube processing always spans all data in an Analyzer database.

Limiting the data has the drawback of making the oldest data not visible in the cube. The benefits are faster browsing response in the cube, shorter Cube processing time and smaller Cube size on disk.

If you have any performance issues with PipeChain Cubes, it is recommended that these settings are cautious, reflecting normal usage. If a user temporarily requests more data, the attribute could be raised temporarily.

### 3.1.4. Supplier integration: sales order and Commission Call-off order line split

The sales order on order head level is now updated by the PW02 transaction.

The split of order lines for sub order type Commission Call-off is corrected.



### **3.1.5. POC: Possible to set if supplier can deliver more than demand quantity**

The selected property number 56 determines if the supplier is allowed to deliver more than demand quantity. See chapter on Selected Property in help documentation.

### **3.1.6. New columns Last Confirmed Quantity and Last Confirmed Shipment Time are added in delivery overview screens and tabs**

Two new columns Last Confirmed Quantity and Last Confirmed Shipment Time are added in all overview screens and tabs displaying inbound, outbound and finished deliveries.

The Column names are "Last Conf Qty" and Last Conf Ship Time". Tool tip information are "Confirmed Quantity 2" and "Last Confirmed Shipment Time".

For inbound deliveries there is a tool tip displaying the last confirmed shipping time in different time zones.

### **3.1.7. Platform: (Technical, DB admin) Demand Plan Storage Format**

We now use a compressed format to store Demand Plan History records in the database. Please note that only new records are stored in the compressed format, existing records remain as they are until they, eventually, are deleted. Over time, this should lead to a dramatically reduction of the database size. Especially the DEMANDPLAN file group.

### **3.1.8. Platform: Performance views in dashboard**

There are some new views available in the Management Dashboard. They can be used to monitor performance of Background Jobs and MACom.

### **3.1.9. Own Market Bucket corrections**

A number of flaws concerning Own Market Buckets has been addressed, especially for buckets with no outflow. The "Update Own Market Buckets" background job no longer fails when it encounters a bucket with neither agreements nor outflow.

### **3.1.10. Wrong partner time and partner resulting balance in inventory chart (In & Out Deliveries)**

Partner time corrected to show receipt time, not shipment time. Partner Resulting Balance corrected to show correct balance was not correct when partner time on a partner demand was same as an outbound delivery.

### **3.1.11. Continue to ship order with status shipped or partly shipped**

The user is now able to 'Continue To Ship Order' on order line level, which previously in a despatch has been marked with 'Delivery Complete', in the order detail screen.

The button is enabled if the order has status shipped or partially shipped and a property is set that the function can be used. Lines where the supplier not has shipped as much as confirmed can be selected to continue to ship on. The selection box can automatically be initiated (if it is possible to continue to ship) if another property is set.

### **3.1.12. POC: Report Translation**

The system now supports translation of reports into different languages. The following reports can be translated: Order, Delivery Note and Invoice.

### **3.1.13. POC: Forecast Number**

The Forecast Number is displayed on the web page Outbound Order Overview and Outbound Order Lines.

### 3.1.14. POC: Cancel Despatch

The system now supports cancelling existing despatches. This function is accessible for users with site administrator privilege and the despatch must not be invoiced.

### 3.1.15. POC: Confirm and reject order interaction is used

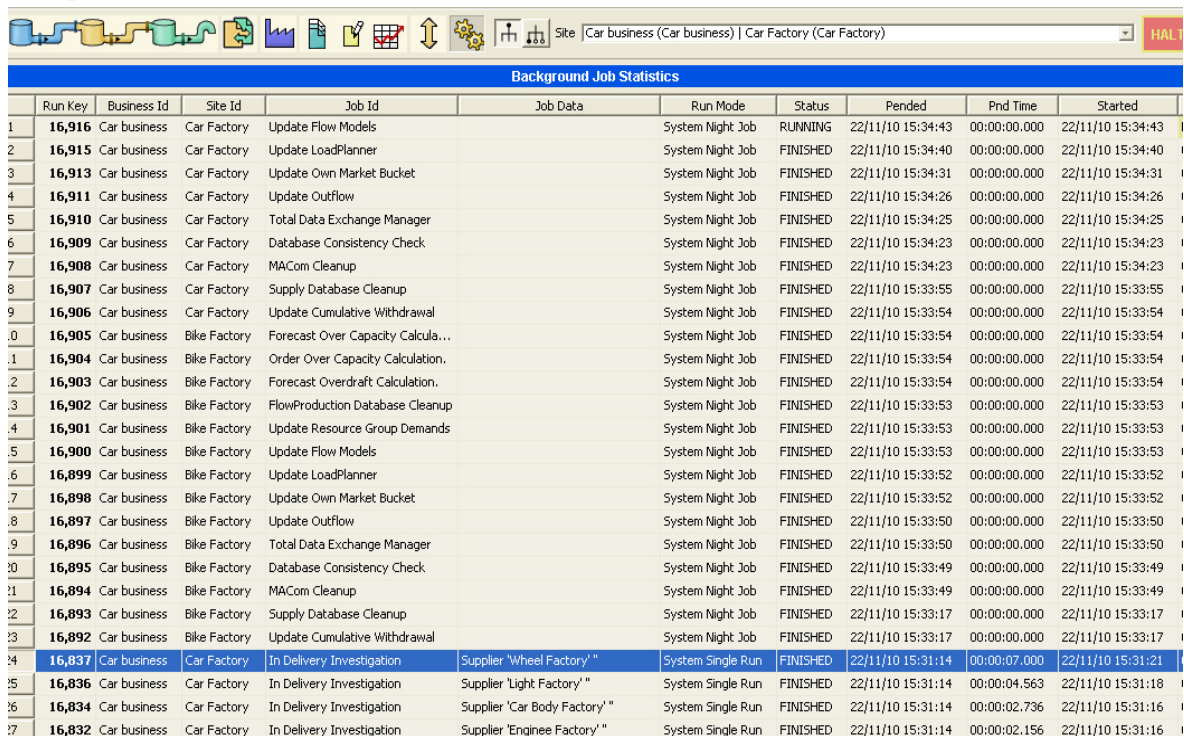
The confirm menu is slightly modified, the text on the 'save' button is changed to 'Save without confirm'.

The reject menu is no longer the same as when confirming. The user is only able to OK or Cancel the reject operation without modifying any data.

### 3.1.16. New screen for Background Job Statistics

A new screen, called Background Job Statistics, can be found in the "System Tools" group. It displays data on Background Job runs. Intended audience are system administrators.

*Example:*



	Run Key	Business Id	Site Id	Job Id	Job Data	Run Mode	Status	Pending	Pnd Time	Started
1	16,916	Car business	Car Factory	Update Flow Models		System Night Job	RUNNING	22/11/10 15:34:43	00:00:00.000	22/11/10 15:34:43
2	16,915	Car business	Car Factory	Update Load Planner		System Night Job	FINISHED	22/11/10 15:34:40	00:00:00.000	22/11/10 15:34:40
3	16,913	Car business	Car Factory	Update Own Market Bucket		System Night Job	FINISHED	22/11/10 15:34:31	00:00:00.000	22/11/10 15:34:31
4	16,911	Car business	Car Factory	Update Outflow		System Night Job	FINISHED	22/11/10 15:34:26	00:00:00.000	22/11/10 15:34:26
5	16,910	Car business	Car Factory	Total Data Exchange Manager		System Night Job	FINISHED	22/11/10 15:34:25	00:00:00.000	22/11/10 15:34:25
6	16,909	Car business	Car Factory	Database Consistency Check		System Night Job	FINISHED	22/11/10 15:34:23	00:00:00.000	22/11/10 15:34:23
7	16,908	Car business	Car Factory	MACom Cleanup		System Night Job	FINISHED	22/11/10 15:34:23	00:00:00.000	22/11/10 15:34:23
8	16,907	Car business	Car Factory	Supply Database Cleanup		System Night Job	FINISHED	22/11/10 15:33:55	00:00:00.000	22/11/10 15:33:55
9	16,906	Car business	Car Factory	Update Cumulative Withdrawal		System Night Job	FINISHED	22/11/10 15:33:54	00:00:00.000	22/11/10 15:33:54
10	16,905	Car business	Bike Factory	Forecast Over Capacity Calcula...		System Night Job	FINISHED	22/11/10 15:33:54	00:00:00.000	22/11/10 15:33:54
11	16,904	Car business	Bike Factory	Order Over Capacity Calculation.		System Night Job	FINISHED	22/11/10 15:33:54	00:00:00.000	22/11/10 15:33:54
12	16,903	Car business	Bike Factory	Forecast Overdraft Calculation.		System Night Job	FINISHED	22/11/10 15:33:54	00:00:00.000	22/11/10 15:33:54
13	16,902	Car business	Bike Factory	FlowProduction Database Cleanup		System Night Job	FINISHED	22/11/10 15:33:53	00:00:00.000	22/11/10 15:33:53
14	16,901	Car business	Bike Factory	Update Resource Group Demands		System Night Job	FINISHED	22/11/10 15:33:53	00:00:00.000	22/11/10 15:33:53
15	16,900	Car business	Bike Factory	Update Flow Models		System Night Job	FINISHED	22/11/10 15:33:53	00:00:00.000	22/11/10 15:33:53
16	16,899	Car business	Bike Factory	Update LoadPlanner		System Night Job	FINISHED	22/11/10 15:33:52	00:00:00.000	22/11/10 15:33:52
17	16,898	Car business	Bike Factory	Update Own Market Bucket		System Night Job	FINISHED	22/11/10 15:33:52	00:00:00.000	22/11/10 15:33:52
18	16,897	Car business	Bike Factory	Update Outflow		System Night Job	FINISHED	22/11/10 15:33:50	00:00:00.000	22/11/10 15:33:50
19	16,896	Car business	Bike Factory	Total Data Exchange Manager		System Night Job	FINISHED	22/11/10 15:33:50	00:00:00.000	22/11/10 15:33:50
20	16,895	Car business	Bike Factory	Database Consistency Check		System Night Job	FINISHED	22/11/10 15:33:49	00:00:00.000	22/11/10 15:33:49
21	16,894	Car business	Bike Factory	MACom Cleanup		System Night Job	FINISHED	22/11/10 15:33:49	00:00:00.000	22/11/10 15:33:49
22	16,893	Car business	Bike Factory	Supply Database Cleanup		System Night Job	FINISHED	22/11/10 15:33:17	00:00:00.000	22/11/10 15:33:17
23	16,892	Car business	Bike Factory	Update Cumulative Withdrawal		System Night Job	FINISHED	22/11/10 15:33:17	00:00:00.000	22/11/10 15:33:17
24	16,837	Car business	Car Factory	In Delivery Investigation	Supplier 'Wheel Factory' "	System Single Run	FINISHED	22/11/10 15:31:14	00:00:07.000	22/11/10 15:31:21
25	16,836	Car business	Car Factory	In Delivery Investigation	Supplier 'Light Factory' "	System Single Run	FINISHED	22/11/10 15:31:14	00:00:04.563	22/11/10 15:31:18
26	16,834	Car business	Car Factory	In Delivery Investigation	Supplier 'Car Body Factory' "	System Single Run	FINISHED	22/11/10 15:31:14	00:00:02.736	22/11/10 15:31:16
27	16,832	Car business	Car Factory	In Delivery Investigation	Supplier 'Enginee Factory' "	System Single Run	FINISHED	22/11/10 15:31:14	00:00:02.156	22/11/10 15:31:16

### 3.1.17. Analyzer: Delivery Precision Error fix

Warranty work to correct that SP-logic does not take into account time zone differences.

Delivery Precision uses a date difference that is measured as the difference between full calendar days. When data on deliveries are reported into Analyzer, the time data are shown and calculated in the server's time zone, instead of the site's time zones, where they to differ.

This means that the time zone adjustment can push a point in time over to another date, which makes the delivery precisions calculations prone to errors when time zones between the site and the server differs. To avoid these errors, the fields used into the calculations are also represented as "Loc" (Locale) -fields that contain the dates that are represented as they are send from the site's time zone. The user will not see any difference, but the calculations will now be correct.

### 3.1.18. Complications with closed days in calendar when working with different time zones

A closed day in a calendar was not always handled correct when a supplier had different time zone compared to the customer site. Note outbound deliveries is not using time zones.

Example:

Site time zone: Japan (+8 )

Supplier time zone: Sweden (+1)

Closed days = Monday

	M	T	W	T	F	S
Japan	xxx	---	---	---	---	---
Sweden	xxx	---	---	---	---	---

Before this correction was made the time zone used when calculating shipment time was the site time zone (Japan). Due to this a shipment time on Monday after 16:00 Swedish time zone was threaded as an open day (equal to Tuesday after 00:00 Japan time zone) which is not correct.

This is now changed so that the calendar is working with the supplier's time zone when calculating shipment times.

Note this error could also create errors when using calendar for calculating different kind of limit dates such as Confirmation Horizon etc.

### 3.1.19. CS05 InboundOrderResponse sending controlled by new Selected Property

The Selected Property 60 SendInboundOrderResponse are added to all instances of CS05 InboundOrderResponse sending. It can be used together with Delivery Subtype Label.

### 3.1.20. POC: CS38 DeliverySchedules – Order Line Despatch

New Selected Property (49) EXCEEDPRECEDINGDELIVERYSCHEДУEQUANTITY, allowed to exceed the demanded Quantity of the preceding (before the last) despatch lines of the delivery schedule. (true/false).

Extended Selected Property (50) ALLOWDELIVERYREMAINDER, Allow incomplete shipments. Valid values: 1,2,3 (1= manual, 2= force, 3= not allowed)

When despatching a delivery schedule the following restrictions are imposed:

The system rejects the despatch if EXCEEDPRECEDINGDELIVERYSCHEДУEQUANTITY is set to false and the given (accepted) delivery quantities are not allowed.

1) Deliveries before the last one are not allowed to be > demanded quantity

2) Last delivery quantity must be <= demanded quantity + allowed quantity deviation

### 3.1.21. POC: CS38 DeliverySchedules – modified confirm menu

The Shipment time and Reception time on order level is no longer an updateable field when confirming the order on the web.

### 3.1.22. POC: CS38 DeliverySchedules – SuborderType change

Orders created by the Delivery Schedule now have the SuborderType (also known as DeliverySubType) "Delivery Schedule". Previously it was "Forecast Order".

Apart from identifying which order that are in fact Delivery Schedule-spawed orders, it has consequences for your Selected Property 1010 DeliverySubType set-up.

### 3.1.23. POC: CS38 DeliverySchedules - Cumulated Element missing yields warning

If there is no Cumulated elements under the DeliverySchedule Product Node, the transaction will process with warnings, and a warning message will be put into the transaction log.

There will be one warning message in the log for each supplier, stating which products for that supplier that are missing cumulative quantities.

There is no way of turning of this warning.

### 3.1.24. POC: CS38 DeliverySchedules - Automatic Confirm of Firm Forecast Rows

Forecast Rows that are also Order Lines are automatically confirmed upon creation if

- a) They are of FIRM status
- b) The new Selected Property 59 AutoConfirmForecastRows are set up with the value of "true".
- c) PW39 is set up to be sent to the supplier.

New Order Lines are also sent with CS05 InboundOrderResponses.

### 3.1.25. POC: CS38 DeliverySchedules - Inbound Order Status change on new Order Line

Whenever a new line is added to an Inbound Order through the Delivery Schedule transaction, that Order will change Order status to "Requested".

### 3.1.26. POC: CS38 DeliverySchedules - Partial Goods Reception

You can now do a partial goods reception. Previous behavior was to always fully receive the shipment regardless of shipped, received and remaining quantities.

The new case for partial shipment is that:

- a) Total received quantity on this order line must be less than the DeliveryQuantity. DeliveryQuantity is fetched from the Order Line, which may be updated in the DeliverySchedule. You can also override this value of DeliveryQuantity by supplying the ReceptionRegistrationOriginalQuantity.

- b) The order line does not exist as a Demand element in the current Delivery Schedule transaction.

Both of these conditions must be filled.

In the case that you made a partial receipt of the Order Line you can receive the remaining quantity in later Delivery Schedule transactions.

If the Order Line was fully receipt, it's moved to Finished Indeliveries.

### **3.1.27. POC: CS38 DeliverySchedules - Change Shipment- and Reception Time for an OrderLine**

There is now the possibility of move an Order Line that belongs to an Order.

On the CS38 Demand element;

If there exists an PO ref (+ PurchaseOrderId PurchaseOrderLineId exists and is not blank), and Product ref is the same as the original OrderLine, and either the Shipment- and Reception Dates differ versus DelivTime and AnnounRcpTime respectively, a move that will happen instead of the normal procedure of replacing the Order Line data in with the Shipment- and Reception Dates.

The move is made by canceling the existing Order Line, and replace it with a new order line. Note that the Business Rules when moving are the same as for the regular replace applies here as well.

In the new order line will have Previous Demand Quantity, Previous Demand Price and Previous Forecast No from the original Order Line.

You must use a PO reference in order to use this functionality. Note that you must use the FCCREATEORDER\_USEORDERID or-USEORDERID\_STRICT order to use the input PurchaseOrderId and LineId when creating an order line.

Also note that the moved delivery will have a new DeliveryId.

Other Order Lines are not affected.

### **3.1.28. POC: CS38 DeliverySchedules - Split Order Line allowed**

CS38 now handles Order Line split.

In order to signal a split Order Line you must state both the "isRemainder" and "RemainderRowNo" attributes on the Demand Element. (Demand Element => Forecast Row => Order Line). The PipeChain process is that the new OrderLine is the one with the (new) RemainderRowNo. Multiple splits are allowed, and RemainderRowNo is sequential.

No warning is given if you are submitting a RemainderRowNo without using isRemainder, but the RemainderRowNo will not be used if you are isRemainder is omitted or its value is false".

### **3.1.29. POC: CS38 DeliverySchedules - Backlog is saved in Demand Plan History**

Backlog is defined as the sum of all demand that are of Forecast status "Firm" and whose Shipment Date is before the current calendar date.

This is saved together with the quantities in Demand Plan History.

### **3.1.30. POC: CS38 DeliverySchedules - Forecast row update change**

When a Order Line is changed, there will be the same behavior as changing the order line through the CS40 PurchaseOrders orderchange scenario.

(Required quantity is updated, but not Last Confirmed).

### 3.1.31. POC: CS38 DeliverySchedules - Multiple forecast rows allowed on same date

If there exists an PO ref (+ PurchaseOrderId PurchaseOrderLineId exists and is not blank) on the CS38 Demand element, that Forecast Row is now identified with the PO-key. Otherwise, the line is identified with Date-key (old behavior).

Date key: Rows uniquely identified by the following:

- Site
- Supplier
- DelivType = 30 (Purchase Order)
- ProdId (Customers)
- ProdVariant (Customers)
- DmdShipTime
- DeliveryRecipient
- GoodsRecipient
- Gate
- RemainderRowNo (new)

The new part of the key is RemainderRowNo, which is the sequence number when an orderline is split.

PO key: Rows uniquely identified by the following:

- SiteKey
- Supplier
- DelivType = 30 (Purchase Order)
- PurchaseOrderId
- PurchaseOrderLineId
- RemainderRowNo

Multiple transaction Demand elements who has uses the Date-key identification, and has the same key, will have the quantity summed to a total, and only the first demand element will be registred, with a quantity equal to the total amount for all demands with the same key.

Demand elements who uses the PO-key must be unique in the transaction

### 3.1.32. Night Job's start time

The Night Job's start time is edited on the "Others" tab in screen Own Site. As of 4.7.0 is that time always expressed in the same time zone for all sites. If that time zone differs from the site's time zone, it will be clearly displayed in the screen. There will also be a button to bring up the "Time Zone Calculator" tool, for easy conversion of times between time zones.

### 3.1.33. Inventory Chart performance

There's been slight performance improvement in the "Closing Inventory" tab in the Inventory Chart.

### 3.1.34. POC: The despatch advice transaction from supplier is not ticking of the quantity correctly

The logic is corrected

### **3.1.35. POC: Supplier Despatch transaction with pallet information**

Pallet information can be read in the PW03 transaction.

### **3.1.36. POC: Forecast screens on web are improved**

New data as:

- Terms of Delivery
- Remainder Row No
- And field showing first demand is added to existing screens

### **3.1.37. POC: VMI Add lines, when time not is used.**

It was not possible to perform the add line function if time was not shown in the order head.

This is now corrected

### **3.1.38. Web page calendar pop-up returned date error when time was 00:00 and thus not shown**

Fixed a script error in the calendar script object where you have to literary write "00:00" both in the Date Field and in the pop-up or you would get a "Date error" message.

### **3.1.39. Analyzer: Changes in Delivery Precision Management**

**A:** Full support for measuring Delivery Precision "at Shipment" vs "at Reception".

A new attribute "Delivery Responsibility" is added to the "Own Site" screen, values ["until Shipment", "until Reception"].

It may be overridden per Partner Agreement, values ["as defined in Own Site", "until Shipment", "until Reception"].

When a delivery is saved to PipeChain Analyzer, "Delivery Responsibility" will control if the delivery record's

"Last Confirmed Shipment Day" OR "Reception Day" will correspond to the time dimension.

In previous versions, Shipment Delivery Precision measures were available, but time dimension always corresponded to "Reception Day".

**B:** Previously, deliveries were moved to PipeChain Analyzer only once, when it became "Finished".

Now, deliveries are moved to PipeChain Analyzer in a far more flexible way.

If "Delivery Responsibility" equals "until Shipment", deliveries are moved to PipeChain Analyzer as soon as "Last Confirmed Shipment Day" is passed. Then they are updated when they become "Finished".

If "Delivery Responsibility" equals "until Reception", they are moved when they become "Finished". There are several use cases causing updates in PipeChain Analyzer, e g if a delivery is "Cancelled" back to a "Confirmed" (or "Shipped") state, and then "Shipped" (or "Received") again.

**C:** Delivery Precision considers reception (or shipment) day and quantity. Now there are more cases where

(erroneous) deliveries are included in Delivery Precision. E g if a delivery should be measured "at Shipment",

and is received although neither confirmed nor shipped. Previously, such a delivery would have been excluded.

**D:** For some user flows, deliveries may be "split" by PipeChain Supply (if the shipment quantity does not match the expected quantity the delivery is split into two rather than becoming "Partly Shipped"). The "splits" will get a Delivery Id suffix "-1", "-2" etc.

In this case PipeChain Analyzer maintains BOTH the splits (which may be updated as above), and a "merged" delivery which contains the summed quantities, and the "proper" times. Only the merged delivery is used in the PipeChainAnalyzer cube, and other Delivery Precision usages. It is guaranteed that merged delivery will have a Delivery Precision error if ANY of the splits have a Delivery Precision error. The "Delivery Id" of the merged delivery will have NO split suffix.

If a split situation results in one single delivery with split suffix (this can occur after split and merge in PipeChain Supply), it will be saved in PipeChain Analyzer WITHOUT suffix. Thus the Delivery Id in PipeChain Analyzer will not differ from its counterpart in e g an order system, however it will differ from its counterpart in PipeChain Supply.

It is possible that the merged delivery consists of several splits with different "Delivery Note Id". If so, the "Delivery Note Id" of the merger will correspond to the delivery with the "lowest non-cancelled Delivery Id suffix".

#### **3.1.40. In & Out Deliveries shows duplicate records if supplier id matches customer id**

If a supplier has the same id as a customer the in & out deliveries tab in the inventory chart dialog shows duplicate records for customer demands and customer balance. These records are shown with the supplier name in the partner name column. The error is now corrected.

#### **3.1.41. Order line detail corrected**

Some quantities and time fields were missing in the New Order Line Detail screen. These fields are now added.

#### **3.1.42. Invoice printout (StdInvoice.xml) corrected**

A number of cosmetic errors and the seller account part has been corrected. The corrections are all made in StdInvoice.xml. Customized invoice printouts have not been adjusted.

#### **3.1.43. Inventory Chart when running with Web Start**

There's been a problem with the Inventory Chart's 'Closing Inventory' tab when the PipeChain client is run via Java Web Start. An error dialog pop up when selecting the tab for a second time. The problem is now fixed.

#### **3.1.44. Delivery Precision did not handle the date condition correctly when supplier/recipient operated in time zones different from the PipeChain Server**

Dates in the PipeChain database are always saved in the PipeChain server time zone. They are then converted to the Site time zone (in some cases the Suppliers time zone) for presentation and



computations. Since Delivery Precision is computed outside the PipeChain application (in SQL Server), there is no time zone compensation. This could cause a moderately late delivery - e.g. shipped at 18:00 day 1 instead of 16:00 day 1 - to be stored as 01:00 day 2 instead of 23:00 day 1. This would erroneously yield a Delivery Precision error.

The error was solved by saving ALL dates involved in Delivery Precision logic BOTH in the server time zone AND in the local time zone. E.g. for an inbound delivery, the local shipment time is saved in the supplier's time zone whereas the reception time is saved in the Site's time zone. Local dates are then used for all Delivery Precision logic. Since the solution requires a database change, it cannot be made available in earlier versions. Historical data in PipeChain Analyzer is not changed.

### **3.1.45. Clean up Products**

The cleaning up of product that can be initiated in the Own Site screen is slightly modified.

The outbound delivery agreement is deleted, if possible, even if the product as such not can be totally deleted.

The cleanup is performed by the background job SupplyDatabaseCleanUp.

### **3.1.46. Select correct order generation strategy**

The order generation strategy is initially fetched from partner agreement and will only be fetched from own site if the 'strategy for exporting data' is set to 'As specified in the Own Site Screen'.

### **3.1.47. POC: Reject of VMI Order without order lines**

The user is not able to reject an order if it is created without order lines, by mistake.

When makes the reject it will get an null exception. This is now corrected and the order will be cancelled.

### **3.1.48. Correction of supplier integration - order type Commission Call-Off**

The AdditionalInformation of type GeneralInformation was not written in the order message to the supplier. The information is keyed in the WebShop as a message to the supplier before the customer is confirming the basket.

### **3.1.49. Platform: Possible to use SOAP servlet with java 1.5**

Two new properties are added to make it possible to use SOAP Servlet in Tomcat running with Java 1.5. In Java 1.5 should external SOAP implementation be used delivered in SAAJ.jar. To use external SOAP implementation with Java 1.5 set property like below in file servlet.properties:

```
pipechain.soap.MetaFactory = com.sun.xml.messaging.saaj.soap.SAAJMetaFactoryImpl
pipechain.soap.MessageFactory =
com.sun.xml.messaging.saaj.soap.ver1_1.SOAPMessageFactory1_1Impl
```

## **3.2 New functions in 4.6.0 service packs**

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### **3.2.1. WebShop: Quick Ordering (SP01)**

A correction is made in the quick ordering fields on the basket page in the Webshop, to show products with product names that contain apostrophe characters (').

### **3.2.2. POC: Web Order Report (SP03)**

On the PDF order report we show now the demanded quantity, price, delivery time and shipment time for the non confirmed lines.

### **3.2.3. New XML transaction CS35 Purchase Order Info (SP07)**

A new XML transaction CS35 Purchase Order Info is now added in PipeChain. This new transaction is used for assigning a Purchase Order Id from a customer to a confirmed outbound delivery. All deliveries with applied Sales Order id is updated with this new Purchase Order Id. Note this transaction also exist in fixed size format, in this case is the used to assign a Purchase Order Id for an inbound delivery with a delivery id from the transaction.

## **3.3 Corrections in 4.6.0 service packs**

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### **3.3.1. Inbound delivery overview (SP01)**

In the client application, deliveries without valid duration are not displayed due to Null Pointer Exception. This error is now corrected.

### **3.3.2. Management Dashboard (SP02)**

The Stock Units graph erroneously showed Stock Value data instead of Stock units data. The error is now corrected.

### **3.3.3. New starting pages in POC (SP02)**

Forecast Overview and Forecast Period Overview have been added as possible starting pages for suppliers logging in to the PipeChain Web portal.

### **3.3.4. Meter status (truck) not updated after despatch (SP02)**

After an order line has been shipped in the despatch screen in the PipeChain One/POC despatch screen the meter status on the corresponding bucket is not updated.

### **3.3.5. Invoiced quantity (SP02)**

In the client application invoice screen and in the invoice transaction(CS80) the value of invoices quantity field is now set to be equal to the shipped quantity.

### **3.3.6. Management Dashboard (SP03)**

The Stock Days graph did not always handle database NULL values correctly. The error is now corrected.

### **3.3.7. Inbound delivery overview (SP03)**

In the client application, deliveries without valid receipt time are not displayed on the screen due to Null Pointer Exception. This is now corrected.

### **3.3.8. Could not enter Total Lead Time in the Delivery Agreement (SP03)**

It was not possible to input a Total Lead Time when creating a new Delivery Agreement. This is now corrected. Note that it was possible to input Transport Lead Time and Production Lead Time.

### **3.3.9. Restored backwards compability for pre 4.5 CS38 PurchaseForecasts (SP03)**

In 4.5, the backwards compability for CS38 PurchaseForecasts was lost when the new transaction interface CS38 DeliverySchedules was implemented. This functionality has now been restored.

Also, the reader was allowed to update Confirmed Quantity when updating an Orderline of Requested or higher status. This is no longer allowed.

### **3.3.10. CS02 OrderResponse; OrderResponseOperation flags only affects deliveries not yet confirmed (SP03)**

Only deliveries of lower status than Confirmed could be cancelled/confirmed with the flags in the attribute OrderHead(nota bene!) OrderResponseOperation. This is now changed so that all deliveries with lower status than Started is affected.

Not to be confused with the attribute OrderHeadOperation.Operation.

### **3.3.11. Shipping does no longer update confirmed and original quantities from orderresponse, CS02 and CS03 (SP03)**

ConfirmedQty resp ConfirmedQty2 (Original Qty resp Confirmed Qty) no longer changed on shipping with transactions CS02 OrderResponse and CS03 DespatchAdvice.

This behavior could previously (since 4.3) be regulated trough Sel Property 115. Now the times are never updated.

### **3.3.12. POC: Fixed Customer Contact Person (ie "Your reference") in CS38 and optional attributes (SP03)**

The field "Your reference" in web screen Create Invoice had been found missing in the CS38 Delivery Schedule transaction. "Your reference" is now assigned to CS38.

InvoiceHead.Customer.ContactPerson. Name attribute, in both incoming and outbound transaction

The field is also no longer editable. Also fixed numerous instances of optional attributes not being optional, despatches being required, etc, that could result in nullpointerexception errors when the transaction was processed.

### **3.3.13. POC: Mail notification for PurchaseOrder creation via CS40 now shows correct Reception- and Order Dates. (SP03)**

Notification mail now contains the same ReceptionTime as shown in the relevant screens.

If OrderDate is missing from the transactions OrderHead element, the current date is used.

### **3.3.14. Outbound VMI Not Yet Received Qty not shown (SP03)**

Web screen Inbound Delivery Overview/Detail did not show correct value of Not Yet Received Qty - the value was always 0. This is now corrected.

### **3.3.15. POC: Incorrect currency in Create Invoice (SP03)**

The lists shown in dropdowns in the Create invoice screen is not always correct. The lists shows settings depending on the user and not depending on the invoice to be created. The errors is now corrected.

### **3.3.16. POC: Order change after split with CS40 identifies with delivery ID (SP04)**

When order change is done on an order line that has been previously split, the existing order line in PipeChain can be identified with delivery id instead of the remainder row number. If so the order line id is overwritten in the order line with the new order line id from the message.

This applies to order systems without capability to keep remainder row number on order lines (line MS Dynamics AX).

**3.3.17. Finished Inbound Order (SP04)**

Order Line tab : The Receipt Time is now shown in the grid instead of the Announced Receipt Time.

**3.3.18. POC: Deviation EMail Correction (SP04)**

The PipeChain system sends a deviation email (MS02) if there is a deviation without taking into consideration the allowed deviations. Order Deviations checked are: Quantity, Shipment Time, Receipt Time and Price.

Despatched Order Deviations checked are: Quantity, Shipment Time and Receipt Time.

Invoice Deviations checked are: Received Quantity, Invoiced Quantity and Confirmed Price.

This is now corrected.

**3.3.19. Inbound Despatch Advice CS48 PurchaseOrderInfo Element missing (SP04)**

In PipeChain version 4.6 there was a schema-change PurchaseOrderId and PurchaseOrderLineId was moved to the Element PurchaseOrderInfo. This element was not present in the actual transaction. The element is now present.

**3.3.20. Reset remainder row in order change after split by the supplier (SP04)**

If the RemainderRowNo was not sent in the purchase order change, we should be able to find the original row that was split by the supplier using DeliveryId. Then update the line with the new order line id from the customer and reset the remainder row no.

In addition: Use remainder row no to find out if it is a remainder instead of using looking in the delivid after a dash (-).

**3.3.21. Order Date for PurchaseOrder creation via CS40 now uses current date. (SP04)**

A missing OrderDate in the transaction was interpreted as 1970-01-01. It is now interpreted as the current date. This also affects data in the Inbound Order screen, as well as mail notifications.

**3.3.22. Missing data and elements in CS39 PurchaseRequisitions (SP04)**

Fixed CS39 transaction where OrderHead information was missing. Also other orderhead sub elements where missing because no order information was passed on to the writer.

When generating the transaction for earlier versions than 4.5, Orderline.Operation could receive a non supported value ("not changed") in these versions.

OrderHead.OrderStatus for transactions PW01, CS01, CS39, CS42, CS71 and CS73 could be faulty. If the orderstatus should be "Accepted without change", it was always set to "Accepted with change". This was for inbound orders only.

**3.3.23. Added OrderText columns in Supplier Detail screen (SP04)**

Previously the OrderText1, 2, and 3 columns where missing in Supplier Detail screen - Inbound deliveries tab, although there were present in the Inbound Delivery Suggestion Overview and Inbound Delivery Overview screens. Added the missing OrderText columns.

**3.3.24. Notification Mail when a PurchaseOrder is created with CS38 Delivery Schedules (SP04)**

Notification mail when a PurchaseOrder/OrderLine is created, canceled or updated are now sent, just as in the corresponding cases in CS40.

Notification upon new DeliverySchedule not implemented in this version (Implemented in 4.7.0).

### **3.3.25. CS40 PurchaseOrders - Canceled Order Lines not present in the Order and does not always work (SP04)**

Removed faulty check for DelivId that caused the canceling of Order Lines not present in the Order element (\* to fail when the last orderline had a non-blank DeliveryId.DeliveryId attribute.

Also added a check to ensure that the order reference (PipeChain- or PurchaseOrderId) is present in the OrderHead when canceling in this way.

(\* With OrderHead.OrderChangeOperation (=CancelOrderLinesNotInThisOrder") or OrderHead.DeleteOrderLinesNotInThisOrder (= true)

### **3.3.26. The reader for the Inventory Report (CS21) is corrected (SP04)**

The reader fails sometimes, especially when consignee data is not in the file.

The error is now corrected.

### **3.3.27. When shortage within frozen horizon decrease lost quantity with confirmed deliveries (SP04)**

When there is a shortage within the frozen horizon the quantity from confirmed deliveries must be taken into account. The problem only applies to customers with long frozen horizon and sales forecast. The error is corrected.

### **3.3.28. Inventory Chart when running with Web Start (SP04)**

There's been a problem with the Inventory Chart's 'Closing Inventory' tab when the PipeChain client is running via Java Web Start. An error dialog popes up when selecting the tab for a second time.

The problem is now fixed.

### **3.3.29. FlowProduction: Error when scheduling "Find First Possible Date" (SP04)**

If "Find First Possible" was selected in the Reschedule Delivery Order dialog, this was not detected if "Allow Forward Scheduling" was also selected.

If the "Find First Possible" operation found no shortages (i.e. the first tested day was possible), a null exception occurred if "Display All Shortages" was selected. This has been replaced by a simple dialog stating that "No shortages were found".

If "Find First Possible" was selected in addition to "Non Joint Scheduling", the scheduling ended prematurely with an erroneous date (today's date). The error is now fixed.

### **3.3.30. CS48 InboundDespatchAdvice missing required attribute Shipment Time (SP04)**

Added ShipmentTime and ReceiptTime on DespatchAdviceLine level. ShipmentTime was mandatory according to the schema, but missing anyway.

### **3.3.31. Webshop: Confirm order on Outbound Order Detail now as actual prefilled dates from CS40 PurchaseOrders (SP04)**

On orderline level you can edit the Shipment- and ReceptionTimes for each orderline. These dates were prefilled with the current date, or the current Shipment-/ReceptionTime.

They are now prefilled with the Demanded Shipment-/ReceptionTime if there is an OrderChange pending.

Note that if

- a) The demanded ShipmentTime is before the current date, the current time will be used.
- b) The demanded ReceptionTime is requested to be before the demanded ShipmentTime per above, the ReceptionTime will be set equal to the ShipmentTime .

On orderhead level the ReceiptTime will be equal to the demanded Receipt time on the OrderHead. (If this is not stated in the orderhead of the transaction it will be equal to the demanded Receipt time of the first orderline in the CS40 transaction).

The ShipmentTime on the OrderHead will be equal to the earliest demanded Shipment Time in the transaction.

- a) The demanded ReceptionTime is before the current date, the current time will be used.
- b) The demanded ShipmentTime is requested to be before the demanded ReceptionTime per above, the ShipmentTime will be set equal to the ReceptionTime.

Please note that on the OrderHead, the ReceptionTime has precedence, both on the Orderlines it is the other way around.

### **3.3.32. WebShop: Correction of supplier integration - order type Commission Call-Off (SP04)**

The AdditionalInformation of type GeneralInforamtion was not written in the order message to the supplier.

The information is keyed in the WebShop as a message to the supplier before the customer is confirming the basket.

### **3.3.33. POC: Reject Order Dialoglet improved (SP05)**

The Dialog for Confirm Order and Reject Order was exactly the same.

The Reject and Confirm operation now uses separate dialogs with appropriate fields and buttons.

### **3.3.34. Supplier integration: sales order and Commision Call-off order line split (SP06)**

The sales order on order head level is now updated by the PW02 transaction.

The split of order lines for sub order type Commission Call-off is corrected.

### **3.3.35. Inbound delivery suggestions wrong when sales forecast used (SP07)**

Inbound delivery suggestions was not correct calculated in following situation: demand inside the frozen horizon, sales forecast model used and low balance. This error is now corrected.

### **3.3.36. Fixed Database Cleanup for DeliveryScheduleProduct (SP07)**

The SQL database call for purging expired DeliveryScheduleProduct was faulty. This has now been remedied.

### **3.3.37. Clean up Products (SP08)**

The cleaning up of product that can be initiated in the Own Site screen is slightly modified.

The outbound delivery agreement is deleted, if possible, even if the product as such not can be totally deleted.

The cleanup is performed by the background job SupplyDatabaseCleanUp.

### **3.3.38. POC: Nullpointer exception in Purchase Order transaction CS40 (SP08)**

A nullpointer exception occurred when Order Operation was “Cancel”. This was resolved.

The next error was masked by the first.

When Order Operation was “Cancel”, an unconditional transaction conflict could occur. This was also resolved.