SALES ORDER MASS MANAGEMENT – SOLUTION OVERVIEW

This document provides an overview of the functionality and benefits of using the Sales Order Mass Management solution to perform Sales Order and Contract mass and system driven changes in the SAP® Business Suite.
I. The Joint Consulting Difference

Joint Consulting is comprised of top-level business and technical experts who design all of Joint products with the following guiding principles:

**User Experience** – At Joint Consulting we know that a product needs to be powerful yet easy to learn and use. An ERP system is often implemented to provide enterprise level benefits but often fails to deliver those benefits at the lower levels of the organization that transact the day to day business scenarios. Many times transaction processing can be more work intensive after the ERP is implemented. At Joint Consulting, the user experience is always a key factor that is considered throughout the design and development process.

**Standardization through Flexibility** – A major benefit of an ERP system is that it seeks to drive the standardization of processes across an organization. This goal is not always realized because it fails to consider that different businesses do not all function the same way, nor do business units within a business. All too often, the end result is that multiple “point solutions” get developed and business process work-arounds proliferate. The result is a solution that is complex, inefficient, and costly to maintain. One of the goals at Joint Consulting is to provide solutions that are flexible enough to be used as a global solution. When used in this manner, Joint Consulting products provide one complete solution around which processes can be standardized.

**Innovation** – At Joint Consulting we believe in the power and value added proposition of the SAP solution. We never look to replace or undermine the functionality that SAP provides. We endeavor to design solutions that take what is already great about SAP and build on top of it. In doing so we strive to imagine and produce solutions that help business realize the full potential of their SAP investment while unlocking trapped costs through the standardization of process, development and training.

**Deliver a Complete Solution** – At Joint Consulting we acknowledge that a technical piece of functionality is not a solution. A solution must address the business process, training, security / authorizations, documentation and reporting. These aspects are always considered. Sample template programs are often included. When you implement a Joint Consulting solution, you are implementing a solution and not just a starting point.

**Reusability** – When a company buys a solution it is a strategic asset that should be able to be leveraged into the future. At Joint Consulting we take a modular approach to building our solutions. They reside in SAP and therefore can be leveraged by other SAP programs and processes. We do this so customers can standardize their development in certain key areas so that a new solution does not have to be developed every time there is a new requirement. This reduces future development time.
as well as reducing the complexity of the solution. All of the Joint Consulting suite of products shares common components that allow these products to seamlessly integrate with each other.

**Automation** – Joint Consulting believes in unlocking trapped costs within business processes. To this end many of the solutions provided enable systematic automation of processes whereas business users only need to manage the exceptions. Automation, when possible, frees-up human capital to focus on more value-added tasks and leaves the repetitive actions to the system.

## II. Introduction to Sales Order Mass Management (SOMM)

SOMM is an application that is installed and accessed directly in SAP ECC. This application along with its supporting components has been designed as a central point of execution and management of mass changes as well as any system driven changes to sales orders and contracts. SOMM provides a standardized solution that manages the complete sales order change process. Since SOMM functionality is installed directly in SAP, it can be leveraged for many business processes both automated and manual.

## III. Benefits of using Sales Order Mass Management (SOMM)

The following are the main benefits of using Sales Order Mass Management:

**Standardization of business process** - The Sales Order Mass Manager can be used as the business standard for processing and managing mass changes and system driven automated changes to sales orders and contracts. Any process that requires orders or contracts to be modified can leverage the functionality of SOMM.

**User Experience and Training** – The Sales Order Mass Manager Console is intuitive, powerful and easy to learn. Once implemented this would be the one place a user would go to manage changes and process exceptions. Users will only need to be trained on one application rather than disparate point solutions.

**Standardization and Simplification of Development** – The Sales Order Mass Manager is a modular solution that can be leveraged to decrease development. Once this solution becomes the standard for sales order changes within an organization, any time a solution needs to be designed that updates sales orders a simpler program can be written to select the data and specify the changes. The Sales Order Mass Manager can then be called by that program. In this model the update methodology,
Exception processing and reporting is already handled by the Sales Order Mass Manager. This makes it easier for the developer who does not need to consider user interaction as well as the user who does not need to be trained on a new solution.

**Ease of Implementation** – The Sales Order Mass Manager is a complete solution that can be used as a stand-alone application but also includes supporting functions to easily embed its functionality into other applications. The solution comes with supporting programs and authorization objects to make it a turn-key solution.

**Flexibility** – The Sales Order Mass Manager is a configurable solution that allows the organization to personalize its functionality.

**Automation of Process** - Since SOMM does not rely on office automation such as uploading spreadsheets, it can be enabled via supporting programs to automate sales order changes without user intervention. Users will only need to manage the exceptions.

**Performance** – The Sales Order Mass Manager has been designed to optimize sales order update performance and limit failures by first attempting to update at the order level and if there is a failure at the order level it will then attempt to update the failed order at the line item level. This allows the highest number of successful updates while maintaining a high level of system performance.

**IV. Sales Order Mass Management (SOMM) Key Concepts and Functionality**

**Selection Sets** – A selection set is a data set that consists of the sales order / contracts and items that need to be changed. The Sales Order Mass Manager allows for simple and complex selection of sales order data. Data sets can be built up from multiple selection steps to form a Selection set. These Selection Sets can be saved and re-used. In addition to being manually created, selection sets can be created by the business logic of any SAP program that calls SOMM or external program that calls the SOMM RFC.

**Field Update Analysis** – Once a data set is selected, the Sales Order Mass Manager evaluates every changeable field for every order / item to determine whether the fields are open for input on the document. As an example, a plant cannot be changed on a sales order / item if it already has a subsequent document (delivery). In limiting the user to only make changes to fields that allow changes, we are greatly reducing the amount of failures that will later need to be reviewed.
Change Logs – Once the data set of documents to update is defined a change log can be generated. In addition to containing all of the changes that will be carried out, the change logs contain administrative data such as who created the changes, when they were created and their processing status. Processing status and update progress is maintained in the change log in real time. Status and errors are captured in the change log for every change that is defined. From within the change log, changes can be re-processed, replicated or undone. If undo is selected the sales orders will be reverted back to their previous state.

Change Log Processing – When the change log is processed, the sales order updates are carried out. The Sales Order Mass Manager allows for four methods of change log processing:

- Execute Immediately Background – This will immediately start the updates as a background process.
- Execute Immediately Online – This will immediately start the update as a foreground process.
- Execute with Nightly Job – This will save the user changes but updates will not be made until a scheduled job picks them up for processing.
- Manual Start – This will save the user changes but updates will not be made until the user manually starts the process.

Reporting – Since all changes are stored in change logs, every change that was made, the process by which it was made and the person or program requesting the change is captured and can be reported upon. As an example, a report variant can be set up to only select change logs that contain a failure so the user or a batch job can re-process them.

V. Overview of Elements of the Sales Order Mass Management (SOMM) Solution

Configuration – Solution Configuration can be used to control the following:

- Updatable Fields – This configuration controls the fields that are available for update through the Sales Order Mass Manager.
- BAPI Field Mapping – This configuration allows the mapping of sales structures to BAPI structures. This allows for flexibility.
Report Configuration – This configuration allows for reporting programs, searches and transactions to be called from within the console application.

Personal Profiles – This configuration allows the user to personalize the user experience with their preferences.

Note – All configuration tables are available within the Console Application

Console Application – This is an intuitive, easy to use console that allows the user to make, manage and report on sales order mass and system driven changes. This is achieved through managing and processing selection sets and change logs. As an example we may have many processes that trigger sales order changes however they all would use the Sales Order Mass Manager and therefore produce change logs that can be managed and reported upon from within the Sales Order Mass Manager Console.

Supporting Functions – In addition to manually created change logs, function modules are supplied that can be used to create change logs within the Sales Order Mass Manager. Therefore anytime a program needs to make sales order changes it can simply call these functions. These functions can be called from within SAP ECC or externally as for example an EDI triggered change.

Scheduling Program – A scheduling program is provided so that changes can be scheduled and processed as a scheduled batch job. In addition this program can be used to automatically re-process change logs that have errors. As an example an order may not have been updated because someone was in it, however it can be re-processed at a later time without user intervention.

Authorizations Objects – The Sales Order Mass Manager respects the standard SAP authorization objects for order and contract changes. In addition the Sales Order Mass Manager comes with its own authorization objects. These objects control additional functionality such as who can create and manage selection sets and change logs.

Template Programs: One of the main differential advantages of the Sales Order Mass Manager is the ability to receive information from a calling program. We have developed several programs that address specific business processes in which sales orders needs to be updated. These programs can be scheduled to run at specified times or in specified intervals and update sales orders without the need for manual user interaction. Several of these programs are provided to use out of the box or serve as templates.
VI. Example Sales Order Mass Management (SOMM) Business Process Variants

Basic Sales Order Mass Management Process Flow:


There are four variants of this basic process. Using the four steps of the basic process we will construct the process variants. The orange flow (Step Performed in SOMM Console by User) indicates user involvement in the process. Flows 2 and 4 are automated processes in which a user would only be involved if they wanted to: Review and Process Exceptions, Report on Results or Undo Changes.

1) Manual Initiated Process from within the Sales Order Mass Manager Console:

Business Process Definition – This process is one in which a user will manually select a data set of sales orders, manually enter the updates to the fields and then manually choose a processing option to perform the updates. Once the updates are complete, they are available for review and reporting.

Business Process Example - A user would like to change the payment terms on all open orders for customer X in sales area 1000/10/01.

Sales Order Mass Management Process Flow:

1 Data Selection – This step is performed by a user working directly in the Sales Order Mass Manager.

2 Update Definition - This step is performed by a user working directly in the Sales Order Mass Manager.

3 Change Log Processing - The method by which this step is to be processed is set by the user in the Sales Order Mass Manager.
4 Reporting, Review and Reprocessing – This step is performed by a user directly in the Sales Order Mass Manager.

**Note:** The SOMM Processing Program can be scheduled at a specified frequency to re-process orders that did not update due to issues that have been corrected such as locking issues or master data issues. Only the exceptions need to be manually managed.

**2) Systematic Initiated Process (Automated Process):**

<table>
<thead>
<tr>
<th>Step Performed in Supporting Program</th>
<th>Step Performed in SOMM Console by User</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 Data Selection</td>
<td>2 Update Definition (Change Log)</td>
</tr>
<tr>
<td>2 Update Definition (Change Log)</td>
<td>3 Change Log Processing</td>
</tr>
<tr>
<td>3 Change Log Processing</td>
<td>4 Reporting, Review and Reprocess of Changes</td>
</tr>
</tbody>
</table>

**Business Process Definition** – This process is one in which a program to support a specific process runs either at a scheduled time or a certain frequency that will generate the sales orders / items that need to be updated along with the update information. The sales orders / items and update information are submitted via function call directly to the Sales Order Mass Manager. The mass manager will process the updates. All of this will take place without any user intervention. Finally the user can review and report on the changes that have been made and process any exceptions.

**Business Process Example** - A business has a requirement to reject any sales order items that already have a delivery against them as their customers will not accept a second delivery on the same purchase order.

**Sales Order Mass Management Process Flow:**

1 Data Selection – This step is performed by a supporting program.
2 Update Definition - This step is performed by a supporting program.

3 Change Log Processing - The method by which this step is to be processed is set by the calling program.

4 Reporting, Review and Reprocessing – This step is performed by a user directly in the Sales Order Mass Manager.

**Note:** The SOMM Processing Program can be scheduled at a specified frequency to re-process orders that did not update due to issues that have been corrected such as locking issues or master data issue. Only the exceptions need to be manually managed.

### 3) Manually Initiated Process from another SAP program (Outside of the SOMM Console):

<table>
<thead>
<tr>
<th>Step Performed in Supporting Program</th>
<th>Step Performed in SOMM Console by User</th>
<th>Step Performed in SOMM Console by User</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 Data Selection</td>
<td>3 Change Log Processing</td>
<td>4 Reporting, Review and Reprocess of Changes</td>
</tr>
<tr>
<td>2 Update Definition (Change Log)</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

**Business Process Definition** – This process is one in which a user will manually initiate sales order changes from within another SAP program. Data selection and field updates are selected by the user or the program they are working in. The user then manually chooses a processing option to perform the updates. Once the updates are complete, they are available for review and reporting.

**Business Process Example** - A user is working in a dialog program in which he selected a group of orders. He wants to remove the delivery block from the sales orders he has selected. The program he is working in has an option to submit the selected orders to the Sales Order Mass Manager to remove the delivery block.
**Sales Order Mass Management Process Flow:**

1. **Data Selection** – This step is performed by the user working in an SAP program.

2. **Update Definition** - This step is performed by the user working in an SAP program. Alternatively this can be a pre-programmed function such as removing a delivery block.

3. **Change Log Processing** - The method by which this step is to be processed is set by the user in the Sales Order Mass Manager.

4. **Reporting, Review and Reprocessing** – This step is performed by a user directly in the Sales Order Mass Manager.

**Note:** The SOMM Processing Program can be scheduled at a specified frequency to re-process orders that did not update due to issues that have been corrected such as locking issues or master data issue. Only the exceptions need to be manually managed.

4) **Systematic Initiated Process from outside of SAP (Automated Process):**

<table>
<thead>
<tr>
<th>Step Performed in SOMM Console by User</th>
<th>Step Performed in Supporting Program</th>
<th>Step Performed in Outside of SAP</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 Data Selection</td>
<td>2 Update Definition (Change Log)</td>
<td>3 Change Log Processing</td>
</tr>
<tr>
<td></td>
<td></td>
<td>4 Reporting, Review and Reprocess of Changes</td>
</tr>
</tbody>
</table>

**Business Process Definition** – This process is one in which a remote function call is made from an external system to SAP to initiate sales order changes. The RFC will pass the sales orders / items from
the external system that need to be updated along with the field updates that will be made and submit them directly to the Sales Order Mass Manager. The mass manager will process the updates. All of this will take place without any user intervention. Finally the user can review and report on the changes.

**Business Process Example** - A business sends suggested sales orders to their customers via EDI. The sales orders are generated in the SAP system with a delivery block pending customer approval. The customer submits back an EDI message with sales order item quantity changes and the approval to process the order. The EDI message is received and sent to the middleware where the Sales Order Mass Manager RFC is called to change the quantities and release the delivery block.

**Sales Order Mass Management Process Flow:**

1. Data Selection – This step is performed by an external system.

2. Update Definition - This step is performed by an external system.

3. Change Log Processing - The method by which this step is to be processed is set by the calling program (SOMM RFC).

4. Reporting, Review and Reprocessing – This step is performed by a user directly in the Sales Order Mass Manager.

**Note:** The SOMM Processing Program can be scheduled at a specified frequency to re-process orders that did not update due to issues that have been corrected such as locking issues or master data issue. Only the exceptions need to be manually managed.

---

**VII. Learn more about the JCI Suite of Applications**

To find out more about the solutions discussed in this Solution Overview or any of the JCI Suite, please visit Joint Consulting Inc. at [www.jcsap.com](http://www.jcsap.com)