



BENSBERG 

Enhancement components

ESA – External Service Agent

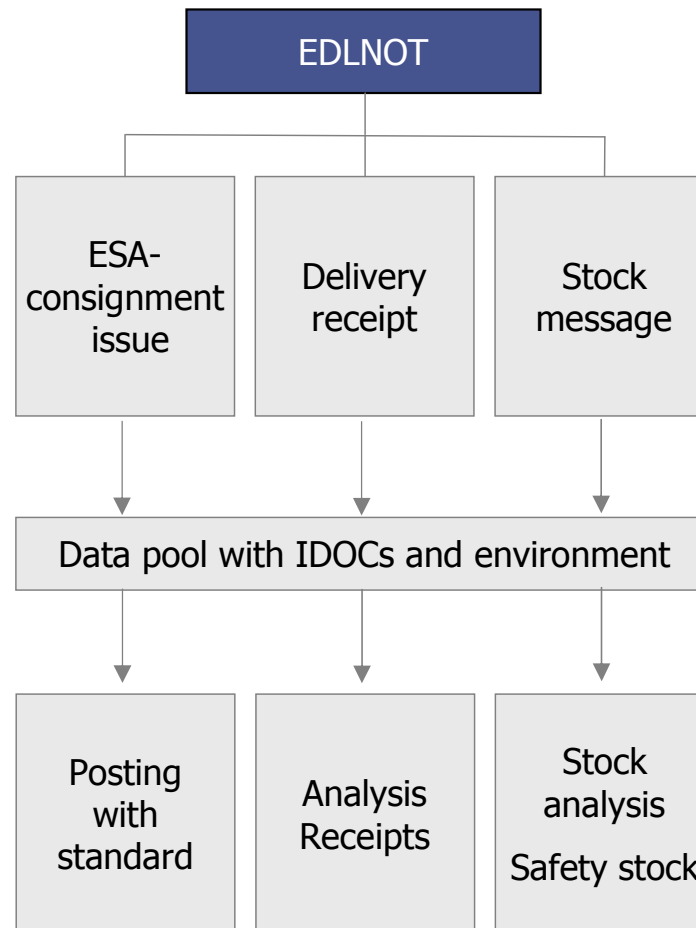
Welcome!

Welcome to the presentation of our
enhancement component

ESA – External Service Agent



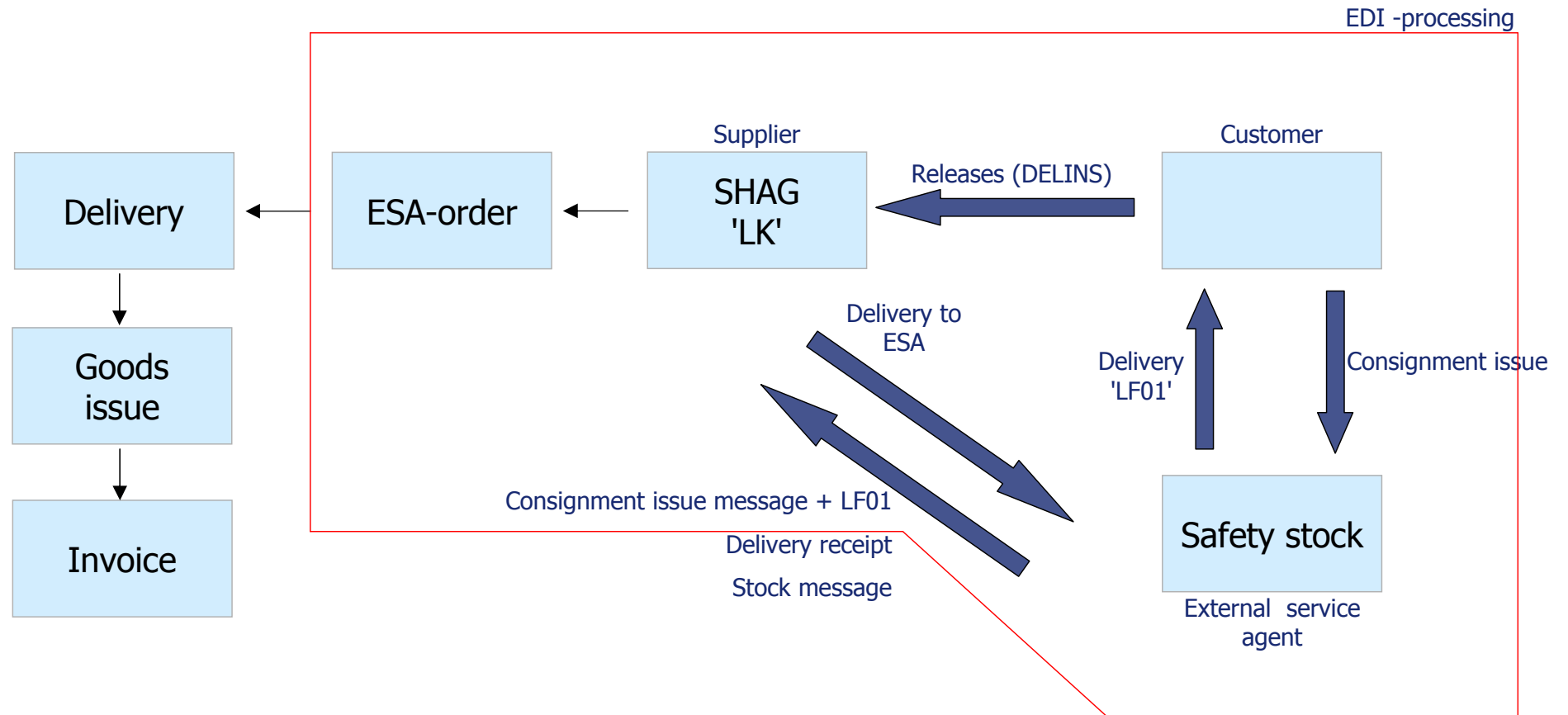
Overview



Overview

- Processing of ESA-messages
 - Consignment issue
 - Delivery receipt
 - Stock
- Entire processing of a consignment issue from IDOC to invoice, alternatively as automated background process
- Analysis for delivery receipts
- Analysis for the document flow (ESA-shipment --> Consignment issue)
- Analysis for the stock messages considering the quantity in transit
- Monitoring of Minimum- und Maximum quantities
- Monitoring of Safety stock with creation of requirements (MD04)

Overview Message communication and Documents

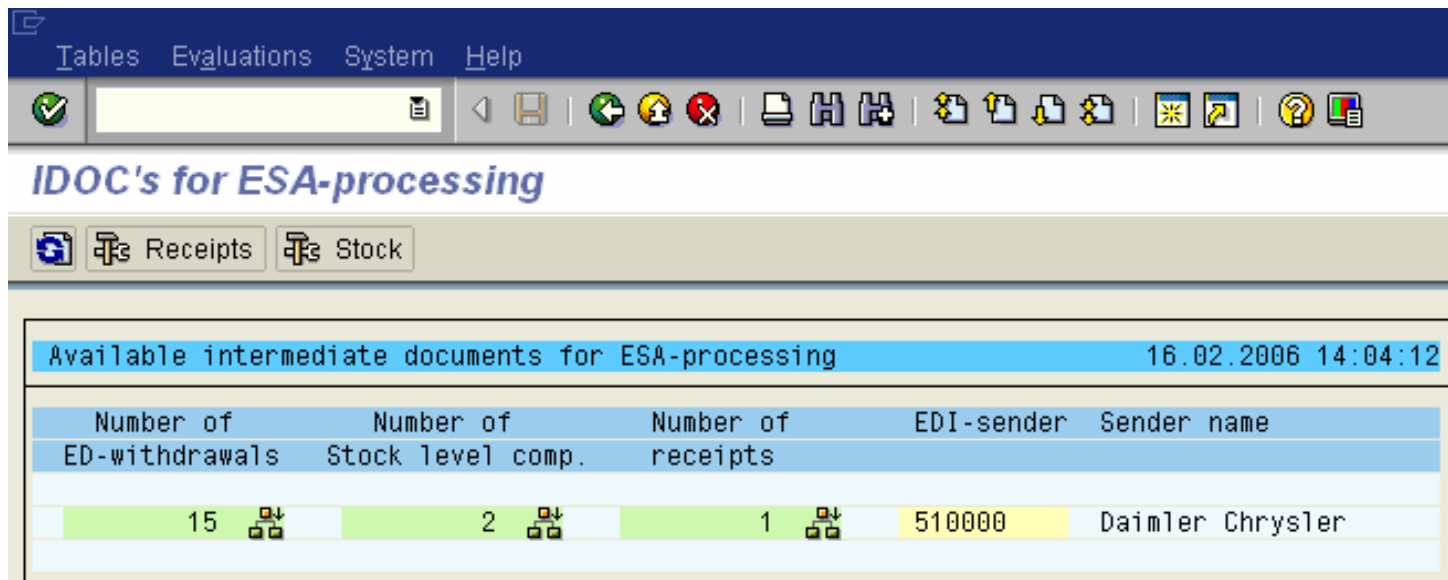


Description Message communication

1. Customer sends delivery schedule (FDS/JDS) to the supplier by EDI (DELINS)
 2. Supplier delivers to the ESA-stock (ESA-shipment) and thus increases the safety stock
 3. Customer withdraws as and when required from the ESA-stock by delivery schedule
 4. External service agent delivers with own delivery number 'LF01'
 5. External service agent transmits the consignment issue message + delivery number 'LF01'
 6. Supplier posts consignment issue. Resultant is an ESA-order with reference to scheduling agreement and internal delivery
 7. Supplier posts goods issue and reduces the safety stock
 8. Supplier creates an invoice indicating the delivery 'LF01'
- External service agent transmits delivery receipt for 2.
 - External service agent transmits stock message for all materials

Bensberg – User interface

- Display of the ESA-messages for each EDI-sender, separately according to message types:



The screenshot shows the SAP 'IDOC's for ESA-processing' interface. It features a menu bar with 'Tables', 'Evaluations', 'System', and 'Help'. Below the menu is a toolbar with various icons. The main area has two tabs: 'Receipts' and 'Stock'. A table displays 'Available intermediate documents for ESA-processing' as of 16.02.2006 14:04:12. The table has five columns: 'Number of ED-withdrawals', 'Number of Stock level comp.', 'Number of receipts', 'EDI-sender', and 'Sender name'. A single data row is visible for EDI-sender '510000' and Sender name 'Daimler Chrysler', showing 15 ED-withdrawals, 2 Stock level comp., and 1 receipt.

Number of ED-withdrawals	Number of Stock level comp.	Number of receipts	EDI-sender	Sender name
15	2	1	510000	Daimler Chrysler

Consignment issue messages

- Consignment issue messages for each sold-to party, customer plant and unloading point

IDOC's of the selected sender (ES-withdrawals)

Foreground
 Background
 Delivery
 Post goods issue
 Invoice
 Total
 IDOC

ES - Withdrawals EDI - sender 510000 16.02.2006 14:10:19

510000 Daimler Chrysler (Sold-to party)
 001 A-01 Tor 5C, Rampe 4 (Plant / Unloading point)

	Cust. material	Material	Sales document					
<input type="checkbox"/>	15 557 440 I X	10021	80000411 WA			LP		
<input type="checkbox"/>	15 557 440 I X	10021	197003 ID			LP		
<input type="checkbox"/>	15 557 440 I X	10021	80000412 WA			LP		
<input type="checkbox"/>	15 557 440 I X	10021	204001 ID			LP		
<input type="checkbox"/>	15 557 440 I X	10021	204002 ID			LP		
<input type="checkbox"/>	15 557 440 I X	10021	80000413 LS			LP		
<input type="checkbox"/>	15 557 440 I X	10021	80000414 LS			LP		
<input type="checkbox"/>	15 557 440 I X	10021	124 ED			LP		
<input type="checkbox"/>	15 557 440 I X	10021	80000417 LS			LP		
<input type="checkbox"/>	15 557 440 I X	10021	126 ED			LP		
<input type="checkbox"/>	15 557 440 I X	10021	204009 ID			LP		
<input type="checkbox"/>	15 557 440 I X	10021	127 ED			LP		
<input type="checkbox"/>	15 557 440 I X	10021	204011 ID			LP		
<input type="checkbox"/>	42 8T4 Z5R ED	10002	80000418 LS			LP		
<input type="checkbox"/>	42 8T4 Z5R ED	10002	204012 ID			LP		

Posting of consignment issues with the dialogue – single steps

Status : IDOC before posting Action : Start IDOC-posting in standard Background

15 557 440 I X 10021 204002 ID LP



Status : ESA-order + Delivery created Action : Post goods issue Post goods issue

15 557 440 I X 10021 80000413 LS LP



Status : Goods issue posted Action : Create invoice Invoice

15 557 440 I X 10021 80000412 WA LP




Status : Invoice created

15 557 440 I X 10021 90000121 RE LP


The created document flow is saved and retrievable at any time

Document flow of IDOC	
0000000000204002	IDOC
532	ES-order for withdrawal
80000412	Delivery, with post goods issue
90000121	Invoice

Posting of consignment issues – Posting modes


- Single step – Posting according to the steps shown on previous slide
- Single step – Posting according to a consignment issue with button  Total
- Block posting by selecting several consignment issues at the same time
- Background process executing all single actions automatically, inclusively logging and analysis of document flow



Detail information concerning consignment issue

Detail data on IDOC		
Detail of ES-withdrawal 0000000000204002		
Status	51	Error: Application document not posted
EDI-Sender	510000	Daimler Chrysler
Sold-to party	510000	Daimler Chrysler
Special stock agent	510000	Daimler Chrysler
Supplier number	1146001	
Plant/Unloading point	001 A-01	Tor 5C, Rampe 4
Customer material	15 557 440 I X	
Material	10021	
Purchase order no.		
Purchase order date	22.09.2001	
Bill of lading	70474	
Dlv.into ESA-stock	80000001	
Delivery to customer	LFKU2199	
Delivery qty. to customer	2	
Time of message	08.01.2006 16:28:00	
Packaging data	available	

Packaging data on IDOC			
Packaging data on IDOC 0000000000204002			
Packag.materials	Material	Quantity	Description
2037	VP_PALETTE_K1	1	




Detail information concerning delivery receipts

Detail Delivery receipts		
Status	51	Error: Application document not posted
EDI-Sender	510000	Daimler Chrysler
Sold-to party	510000	Daimler Chrysler
Special stock agent	510000	Daimler Chrysler
Supplier number	1146001	
Plant/Unloading point	001 A-01	Tor 5C, Rampe 4
Customer material	42 8T4 Z5R ED	
Material	10002	AL-Connector SS1
Purchase order no.		
Purchase order date	20.01.2002	
Bill of lading	55214	
Dlv.into ESA-stock	80000188	6
Quantity into ESA-stock		6
Time of message	28.10.2004 13:07:41	
Packaging data	available	

Detail information concerning stock level

Detail data on IDOC		
Detail display Stock		
00000000000159007		
Status	51	Error: Application document not posted
EDI-Sender	510000	Daimler Chrysler
Sold-to party	510000	Daimler Chrysler
Special stock agent	510000	Daimler Chrysler
Supplier number	1146001	
Plant/Unloading point	001 A-01	Tor 5C, Rampe 4
Customer material	42 8T4 Z5R ED	
Material	10002	AL-Connector SS1
Purchase order no.		
Purchase order date	22.09.2001	
Delivery		
Time of message	28.10.2004 13:00:49	
Stock level ESA-stock	5.000	
Own special stock level	2.147	
Deliveries unreceipted	100	
Safety Stock YYF8	40	

   Receipts

Analyses

The following analysis options are provided for the ESA-environment:

Completion confirmation status

Document flow

Delivery numbers

Stock levels

Status of completion confirmation

Check of EDI-receipt of ESA-deliveries							21.02.2005 12:03:57
510000		Daimler Chrysler			(Sold-to party)		
001	A-01	Tor 5C, Rampe 4			(Plant / Unloading point)		
Sched agree.	Delivery	Material	Delivery qty	Unit	PGI-Date	Status of receipt	
30000001	80000225	10002	100	ST	23.01.2004	Receipt missing	
	80000195	10002	450	ST	25.04.2003	Receipt at 08.06.2003	
	80000193	10002	1.350	ST	22.04.2003	Receipt missing	
	80000190	10002	5	ST	03.12.2002	Receipt with note	
	80000189	10002	186	ST	03.12.2002	Receipt missing	
	80000188	10002	6	ST	03.12.2002	Receipt with note	
	80000187	10002	5	ST	03.12.2002	Receipt missing	
	80000186	10002	2	ST	03.12.2002	Receipt missing	
	80000185	10002	1	ST	03.12.2002	Receipt missing	
	80000177	10002	2	ST	03.12.2002	Receipt missing	
	80000176	10002	1	ST	03.12.2002	Receipt missing	
	80000175	10002	1	ST	03.12.2002	Receipt missing	
	80000174	10002	10	ST	25.11.2002	Receipt missing	
30000004	80000248	10021	12	ST	19.02.2004	Receipt missing	
	80000247	10021	24	ST	19.02.2004	Receipt missing	
	80000168	10021	3	ST	15.09.2002	Receipt missing	
	80000167	10021	2	ST	15.09.2002	Receipt missing	
	80000165	10021	1	ST	15.09.2002	Receipt missing	
	80000163	10021	1	ST	15.09.2002	Receipt missing	
	80000160	10021	1	ST	15.09.2002	Receipt missing	
	80000154	10021	1	ST	15.09.2002	Receipt missing	
	80000153	10021	1	ST	15.09.2002	Receipt missing	
	80000140	10021	3	ST	14.09.2002	Receipt missing	

Comments for the confirmation receipt of a delivery

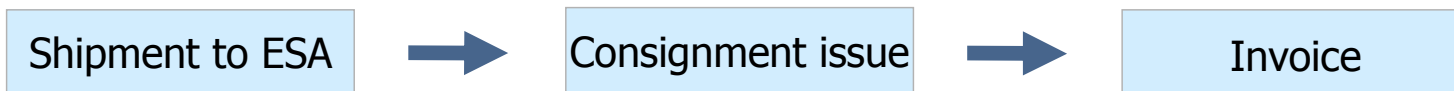
IDOC	0000000000076001
Scheduling agreement	30000001
Delivery	80000190

Delivery qty IDOC	10 ST	LF	5 ST
-------------------	-------	----	------

Document flow


Bensberg GmbH - SD/402108/ESA

Control of EDL-deliveries with document flow								02.03.2006 01:03:15	
Delivery for ESA	Qty.	UT	GI-date	Delivery of ESA	Date	Quantity	Invoice		
81377833	1.800	PC	28.02.2005						
81377655	1.848	PC	01.03.2005						
81377652	400	PC	01.03.2005	10009792	09.03.2005	40	90892800		
				10009791	09.03.2005	40	90892799		
				10009788	09.03.2005	40	90892798		
				10009787	09.03.2005	40	90892797		
				10009779	09.03.2005	40	90892796		
				10009771	08.03.2005	40	90892147		
				10009770	08.03.2005	40	90892146		
				10009768	08.03.2005	40	90892145		
				10009760	08.03.2005	40	90891797		
				10009756	08.03.2005	40	90891414		
81377651	700	PC	01.03.2005	10009776	09.03.2005	70	90892143		
				10009775	09.03.2005	70	90892142		
				10009774	08.03.2005	70	90892141		
				10009767	08.03.2005	70	90892140		
				10009766	08.03.2005	70	90892139		
				10009764	08.03.2005	70	90891793		
				10009763	08.03.2005	70	90891792		
				10009757	08.03.2005	70	90891791		
				10009755	07.03.2005	70	90891409		
				10009753	07.03.2005	70	90891408		
81377613	240	PC	28.02.2005						



ESA – Delivery numbers

Bensberg GmbH - SD/402108/ESA

 Without gaps

ESA-deliveries (from External service agent to customer) 02.03.2006 01:08:32

210000695 DaimlerChrysler AG LN 11900396 (EDI - sender)

ESA-delivery	IDOC	ESA-order	Date	Time
15800545	5620183	4454814	25.01.2005	10:18:01
15800546	5621525	4454801	25.01.2005	10:16:36
15800547	5623049	4454815	25.01.2005	10:18:03
15800548	5629088	4454816	25.01.2005	10:18:06
15800549	5633560	4454817	25.01.2005	10:18:08
15800550	5637372	4454818	25.01.2005	10:18:10
15800551	5639760	4454819	25.01.2005	10:18:12
15800552	5642072	4454820	25.01.2005	10:18:14
15800553	5643386	4454821	25.01.2005	10:18:16
15800554	5643387	4454802	25.01.2005	10:16:38
15800555	5644491	4454822	25.01.2005	10:18:18
15800556	5649561	4454823	25.01.2005	10:18:20
	<- - - Multiple			
15800556	5653680	IDOC has been deleted		
	<- - - Multiple			
15800556	5653711	IDOC has been deleted		
15800557	5654335	4455318	26.01.2005	08:18:33
15800558	5658780	4456727	31.01.2005	08:28:06
15800559	5658781	4456726	31.01.2005	08:28:03
15800560	5661018	4456728	31.01.2005	08:28:08
15800561	5664680	4457734	02.02.2005	09:54:11
15800562	5664681	4457733	02.02.2005	09:54:08
15800563	5668212	4458593	04.02.2005	08:17:43

Document flow IDOC → Invoice

Bensberg GmbH - SD/402108/ESA

Document-flow ESA-csgmt.issues		21.02.2005 16:09:05	
IDOC : 000000000032007	Scheduling a		
	ES-order	00.00.0000	00:00:00
	Delivery	The document has not yet been created	
	GI-Posting	The document has not yet been created	
	Invoice	90000115	18.02.2005 15:28:34 BENSBERG
IDOC : 000000000052011	Scheduling a	30000001	
	ES-order	109	18.02.2005 15:11:11 BENSBERG
	Delivery	80000353	18.02.2005 15:11:11 BENSBERG
	GI-Posting	The document has not yet been created	
	Invoice	The document has not yet been created	
IDOC : 000000000053001	Scheduling a	30000001	
	ES-order	108	18.02.2005 14:52:58 BENSBERG
	Delivery	80000352	18.02.2005 14:52:58 BENSBERG
	GI-Posting	The document has not yet been created	
	Invoice	The document has not yet been created	
IDOC : 0000000000159006	Scheduling a	30000001	
	ES-order	106	28.10.2004 14:26:44 BENSBERG
	Delivery	80000324	28.10.2004 14:26:44 BENSBERG
	GI-Posting	80000324	28.10.2004 14:27:30 BENSBERG
	Invoice	90000092	28.10.2004 14:27:41 BENSBERG
IDOC : 0000000000159009	Scheduling a	30000001	
	ES-order	107	28.10.2004 14:26:51 BENSBERG
	Delivery	80000325	28.10.2004 14:26:51 BENSBERG
	GI-Posting	The document has not yet been created	
	Invoice	The document has not yet been created	
IDOC : 0000000000160001	Scheduling a	30000001	
	ES-order	110	18.02.2005 15:31:35 BENSBERG
	Delivery	80000354	18.02.2005 15:31:35 BENSBERG
	GI-Posting	The document has not yet been created	
	Invoice	The document has not yet been created	

Stock overview with quantity in transit

Stock-overview ES-agents

Table YYF8SB

Overview stock for ES-Agent 21.02.2005 15:18:52

Special stock agent 510000 Daimler Chrysler

Material	Safety-stock ESA	Act. stock ESA	Safety-stock own	Act. stock own	
10002	100	2.147	1.000	134.102	●●●
10011	150	17	0	1.993	●●●
10021	240	61	0	11.774	●●●

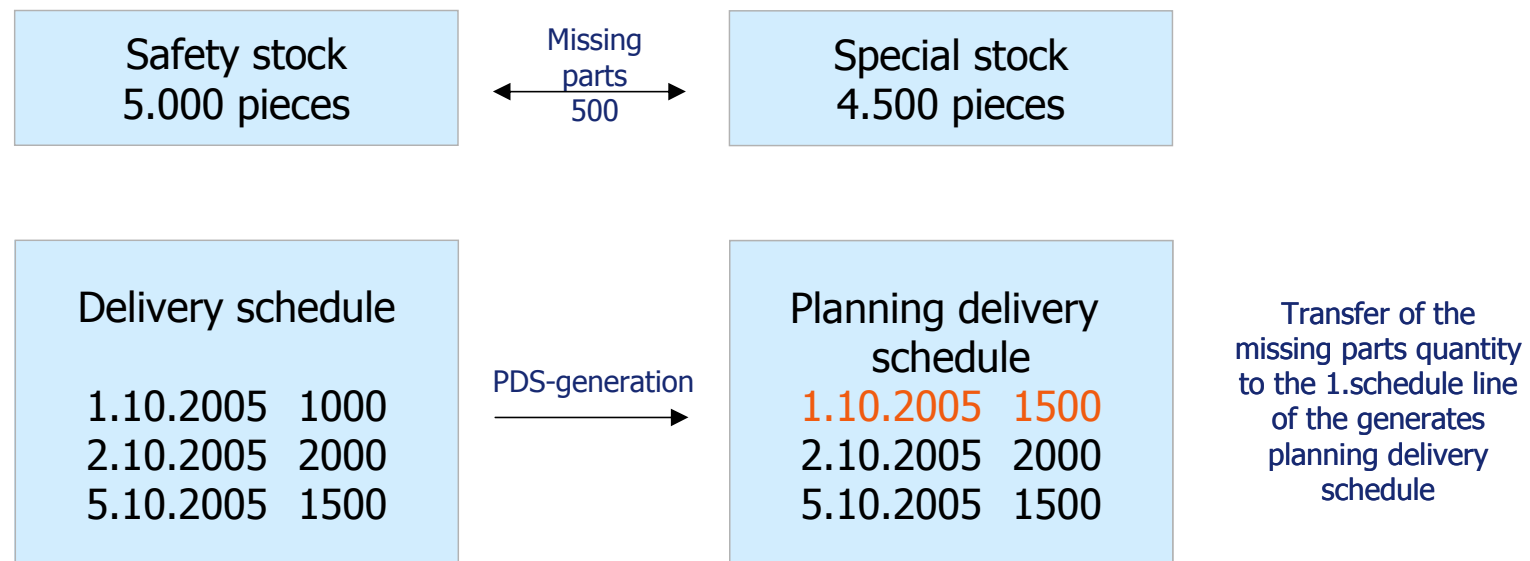
Green traffic light --> The ESA-stock corresponds to the own special stock

Yellow traffic light --> There is a difference, but it corresponds to the quantity in transit

Red traffic light --> There is a difference, which does not correspond to the quantity in transit

Safety stock

- Monitoring of safety stock with analysis
- Analysis of minimum and maximum quantities
- Generation of independent requirements by creating planning delivery schedules (from FDS) in SD:



Fast entry of ESA-messages

- Manual entry of ESA-messages, e.g. for the entering of extra deliveries without involving an ESA
- Own user interface
- Creation of EDLNOT-IDOC

User interface Fast entry

ESA - Fast entry withdrawal

Data IDOC-Transfer

EDI-Sender: 510000 Withdrawal Receipt Stock

Administration data

Sold-to prty:

Cust.plant:

Unload.point:

Delivery to customer

Customer mat.:

Delivery to cust.: Item:

Deliv.qty.:

Dlv.date:

Order data

P.O. number:

P.O. date:

Environment

Dlv.to ESA-stock:

Embedding of the Bensberg components in the SAP R/3

- Add-on to R/3
 - Programmed in "ABAP" (Advanced Business and Application Programming)
 - own name range, assigned by SAP (/BEE/)
 - thus, no intervention in R/3, but access on R/3-data
- runs under R/3-Releases 4.0 - 5.0 with or without Automotive
- automatic generation by SAP-Standard transport
- available language versions: D, E, F, ES

Thank for your time and interest.

If you still have questions and/or need further information
please don't hesitate to contact us.

Bensberg Unternehmensberatung GmbH

Posthof 2
53783 Eitorf
Deutschland

Telefon: 02243 83822
Fax: 02243 80502

www.bensberg.de
info@bensberg.de