Container stowage programs and electronic reporting

by
Désiré Savelkoul
Autena Marine
A "system integrator" for inland shipping



History, 1997

- Stowage programs on board sins 1997
- Five manufactures
- A marked of about 250 container vessels in total

Now, 2008

- Two manufactures
- A marked of about 500 container vessels (source: BTB)
- About 300 vessels are equipped



Why?

M.S. Excelsior (2007)



M.S. Ferox (2006)



What is a container stowage program?

- A "tool" for container dispatch on board
- Developed out of the practice
- Make a stowage plan easily with a mouse
- Dangerous Goods Module integrated
- Stability –Module integrated



For whom?

- Vessels which do container transport, from big (500 TEU) to small (32 TEU)
- Also for push boats with barges
- Multilingual; Dutch, German en French



Import loading list

- Manually import
- Import automatically BICS-ASCII -message
- Import automatically IFTMIN message (is a international accepted EDIFACT –message)

Advance?

- Time profit
- Less chance on mistakes

Bossche Container Terminal Tel: 079-627966 / Faz: 079-620818 E-mail: BCT@BCT-BCTN.NL							Voyage manifest outgoing, page 1, printed: 03-04-2002 16:50 Voyage / barge MAN020404U / MANUELA / 0650-213023 ETD DEN BOSCH, 04-04-2002 ETA ROTTERDAM, 04-04-2002				
	Container	Nett. (kgs)	Delivery reference	Shipping comp.	Destination	Cargo detalla	Sealnumber	Document	P08.	Booking	Remarks
Ful	- 20 ft. Dry van										
1	CAXU 257197 5	16.176	LDNZL00064	LYKESLINE	LYKES INNOVATOR /	1176 COLLI BEER	385754	AGD - 80060225	4	2403297	
2	GATU 011592 4	16.176	5024505	P&O Nedloyd	PON GENOA / HAMILTON	1176 COLLI BEER	385843	AGD - 80060161	4	2403312	
	HJCU 860117 1	19.401	5073101	Hanjin Shipping	OOCL SHANGHAI / KEELUNG					2403010	
4	HLXU 216252 7	17.420	36333681	Hapag-Lloyd	PON ROTTERDAM / VARNA		398799	AGD - 80059026		2402868	
	HLXU 230076 0	16.646	36333681	Hapag-Lloyd	PON ROTTERDAM / VARNA		398989	AGD - 80059025	4		
•	MLU 951801 7	15.696	LDNZL00064	LYKESLINE	LYKES INNOVATOR /	1356 COLLI BEER	385807	AGD - 80060229	4		
	MLU 956674 0	12.374	LDNZL00064	LYKESLINE	LYKES INNOVATOR /	915 COLLI BEER	385777	AGD - 80060228	4		
	LYKU 300224 1	15.940	LDNZL00064	LYKESLINE	LYKES INNOVATOR /	1176 coll beer	385809	AGD - 80060227	4	2403297	
	NYKU 244987 5	14.224	RTM16116		PON HOUTMAN / HONG	560 calli sodium	AA95156	EX1 - 2111721	4		SDR CONTAINER
	OCLU 093633 3	16.176	5023978	P&O Nedloyd	PON GENOA / HAMILTON	1176 COLLI BEER	385784	AGD - 80060170	4	2403316	
	POCU 062818 0	15.940	5024505	P&O Nedloyd	PON GENOA / HAMILTON	1176 COLLI BEER	385774	AGD - 80060164	4		
	PONU 012196 5	14.969	5024505	P&O Nedloyd	PON GENOA / HAMILTON	1093 COLLI BEER	398997	AGD - 80060163	4	2403312	
	PONU 091083 4	15.940	5023978	P&O Nedloyd		1176 COLLI BEER	385925	AGD - 80060174	4	2403316	
	TRLU 289187 0	16.603	NYKRTM15429		LYKES INNOVATOR /	1368 COLLI BEER	385779	AGD - 80060298	4	2403224	
	TRLU 305591 4	17.420	NYKRTM15429	Nyk Benelux B.V.	LYKES INNOVATOR /					2403225	
Full	- 40 ft. Dry van -										
1	INBU 494085 1	20.015	5073132	P&O Nedloyd	NYK CASTOR / TOKYO	2288 COLLI BEER	385848	AGD - 80062066	4		
2	INBU 522442 4	20.015	5073132	P&O Nedloyd	NYK CASTOR / TOKYO	2288 COLLI BEER	385805	AGD - 80062057	4	2403583	
	NYKU 610323 7	25.000	RTM15753		PON HOUTMAN / BANGKOK						DOUANESTOP IN
4	PONU 130491 3	16.288	5028803	P&O Nedloyd	SINGAPORE EXPRESS /	800 COLLI MILKPOWDER	CVM7082	EX1 - 2111723	4		pall.lading, laden voo
	TGHU 435181 8	25.000	RTM15753		PON HOUTMAN / BANGKOK						DOUANESTOP IN
6	TRLU 623702 3	25.200	RTM15753		PON HOUTMAN / BANGKOK		AA02382	EX1 - 1530966	4		DOUANESTOP IN
7	TTNU 432029 5	25.200	RTM15753		PON HOUTMAN / BANGKOK		AA02433	EX1 - 1530959	4		DOUANESTOP IN
	TTNU 466886 6	16.288	5028803	P&O Nedloyd	SINGAPORE EXPRESS /	800 COLLI MILKPOWDER	CVM7081	EX1 - 2111722	4	2402795	pall lading,laden voo
Ful	- 40 ft. high cube										
1	HJCU 103974 0	0	RTM2320036	Hanjin Shipping	HJ CAIRO / PUSAN					2403404	
	HJCU 107792 5	26.520	RTM2320036	Hanjin Shipping	HJ CAIRO / PUSAN	MIXED METAL SCRAP		SAG - 00000287		2403404	
	HJCU 781094 2	26.600	RTM2320036	Hanjin Shipping	HJ CAIRO / PUSAN	mixed metal scrap		SAG - 00000285	4		
4	SENU 505915 0	26.300	RTM2320036	Hanjin Shipping	HJ CAIRO / PUSAN	MIXED METAL SCRAP		SAG - 00000288	4	2403404	
	- 20 ft. Dry van										
1	GATU 056141 7	13.182	5012109	P&O Nedloyd	CS ACTION / MELBOURNE		AA95153	EX1 - 80175234	4		douanestop in helmo
	HLXU 227206 2	14.210	33667930	Hapag-Lloyd	CAP DOMINGO /	560 COLLI MILKPOWDER	AA95152	EX1 - 60046751	4		DOUANESTOP IN
•	MSCU 128265 1		207SC1200042	MSC-Nederland	MSC NATALIA / LAS	519 COLLI MOUSSE	AA95151	EX1 - 60046772	4	2403403	
	- 40 ft. Dry van -			_							
	EISU 143268 9	18.897	221910131	Evergreen	EVER REPUTE / NEW YORK		398983	AGD - 80060562		2403238	
2	GSTU 677895 7	24.768	221990141	Evergreen	LT UTILE / HONG KONG	2880 COLLI BER	398907	AGD - 80060504	4	2403237	
3	HLXU 416510 3	15.764	30000677	Hapag-Lloyd	RIJA/HELSINKI	1775 COLLI BEER	398815	T2L - 60058851	4	2402873	Voor helneken geen
Full	- 40 ft. Dry van -										
1	CAXU 457200 7		RTM17160300	Hanjin Shipping	MING LONGEVITY / MIAMI	2376 COLLI BEER	385780	AGD - 80062529	4	2403553	
Ful	- 40 ft, high cube	- HANNO P	IER 6								



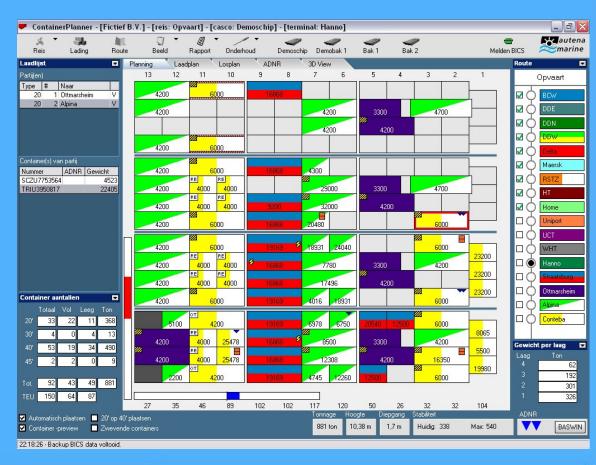
Making a stowage plan

- Loading list will be automatically sorted
- Containers with dangerous goods will be marked
- Other properties of the containers will be displayed with symbols
- Stow the container with one click of the mouse
- During stowing of each container the stability will be recalculated
- Situation of the vessel will be displayed (clinometer)



Making a stowage plan

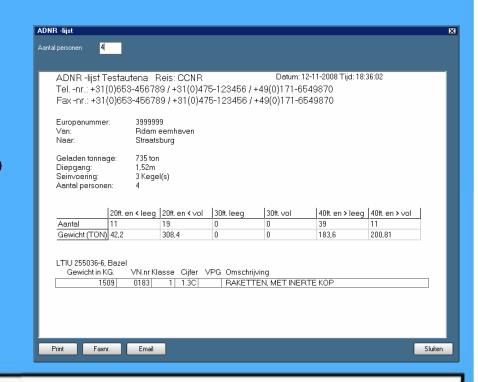
- Total amount of bleu cones is displayed (also total per container)
- Current and maximum stability is displayed continually
- Draft and height is displayed





Loading

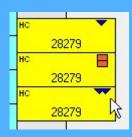
- Stowage plan send out of stowage program by fax or by mail to the each loading/unloading terminal
- Send container list for example to the container operator
- Send dangerous goods list by example to the fairway administration = that is the past!





Electronic Reporting

- BICS is integrated in the ContainerPlanner stowage program
- Therefore electronic reporting is easily
- BICS is necessary for reference date like;
 - Place- en terminal -codes
 - (Dangerous goods- and HS) cargo codes
 - Calculate amount of blue cones of dangerous goods (BAS)





Whit one button you easily report your voyage

- Just fill in the amount of people on board
- Automatically the cargo data and the amount of blue cones will be exported out of the container stowage program to BICS

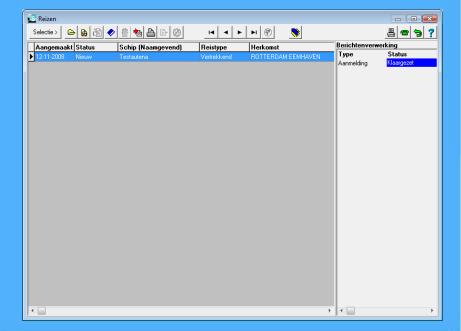




Electronic Reporting

BICS

- After export BICS will automatically start up
- Voyage will automatically imported in BICS and prepared to send
- It is possible to make adjustments
- Voyage can be send away



Future

- Voyages directly electronic reported out of the ContainerPlanner stowage program (to the ERI-NET –server)
- Only when reference date is public available
- Better calculate the stability, especially for small container vessels
- Better determine the actual weight of the container
- Terminal planning? (Congestion in the seaports)



Conclusion

- Electronic reporting of containers is possible
- But there is a lot to be improved:
 - Loading lists standardised delivered on board by container operator
 - Standardisation of reference data by the public sector as well by the private sector all over Europe
 - Appropriate maintenance of these reference date
- Do not search for possible problems, but solve them quick when they appear
- Not only by the public sectors, but also by the private sectors



Questions?

Thank you for your attention

