

ENGINEERING TOMORROW

User Manual

PLUS+1[®] Mobile Machine Displays Classic to Vector-Based Screen Editor





Revision history

Table of revisions

Date	Changed	Rev
March 2019	First edition	0101



Contents

Classic to Vector-Based Screen Editor SW Migration

Definitions and Area Pages	4
Create new project	4
View Logical Net	5
Show Screen	5
New Screen Definition	6
Vector-Based Screen Editor	7
Import images	8
Additional signal inputs	8
Classic Screen Editor signal inputs example	8
Vector-Based Screen Editor signal inputs example	9
Data value formatting	9
Classic Screen Editor data value formatting	9
Vector-Based Screen Editor data value formatting	.10
5	



Definitions and Area Pages

Open the DP project and remove all **Definitions and Areas Pages** from the code.

Opened DP project



Removed Definitions and Areas Pages





Create new project

Create a new project with the appropriate DM HWD and template.

Route the I/O to the corresponding application signal, in this example, the DP naming convention will be used.

Default names in template





DP application software



View Logical Net

Go to View Logical Net > Change Port Names across Pages > Define new Name for <2> Ports and change names from Btn_1 to Sw_Soft1 and so forth.

Change port names



After port name change

Buttons			Buttons
~	\Sw_Soft1	⊢ <u>l⇒l</u> -	oSw Pulse Soft∣
<	≷Sw_Soft2	⊷	Sw Pu]se Soft2
<pre> </pre>	∢ <u>Sw_Soft3</u>	- <u>l⇒⊥</u>	Sw_Pu]se_Soft3
<pre></pre>	< <u>Sw_Soft4</u>	- <u>_</u>	>Sw_Pulse_Soft4

At this point the code should compile without errors.

Show Screen

Add a **Show Screen** component in the page where the Definitions and Areas Pages were removed.

Added Show Screen





New Screen Definition

Query the Show Screen component and create a New Screen Definition

Select Screen Definition	Scree	n Definition Buses	Select	AI		Select All
InitScreen	Input b	bus members not in Input	*	Add	Output bus members not in Output	Add
	New Screen Name: MainScreen	Definition		Cancel	Pefinition bus members not in output	t bus 🔺

New Screen Definition

Add necessary bus inputs, which makes the signals available in the screen editor.

Add necessary bus inputs

elect Screen Definition	Screen Definition Buses	elect All 🔽	S	elect All
	Input bus members not in Input	Add	Output bus members not in Output	Adr
MainScreen	Alarm Buzzer	7		
	Alarm No	V		
	Alarm No Disp	V		
	Alarm_No_Disp_On	V		
	Enable			
	Engine_Rpm	V		
	Engine_Temp			
	Fuel	V		
	Definition bus members not in input bu	is 🔺	Definition bus members not in output b	us 🔺

In the DP code, the Define Areas for this page had a black background.





241.2000 157.3000

Vector-Based Screen Editor

In the Vector-Based Screen Editor, you may either select a line and scale it appropriately or create and import an image of appropriate scale. In the following example, a line element was used.

Vector-Based Screen Editor

File Edit View Hel	p			
B-A-1		🕱 Standard Buttons 🔹 🔎 (a) al 🚺		
		× IntScreen * A HainScreen *	() , x	
Screen Manager				Project Library Screen Definitions
 ▲ MainScreen / Line_1 → POU Cals > ↔ Input ↔ Output 				Soreen Library Age Init Age Age Age (English) Determal Library Translation
nspector	- 	Display Avrt		
Dascrinkov	1			
E Lavout:	None, Left, False, Top. 0, 100, 0, 0, 0, 0, 0, False			Selector External Libraries
Lavout Manager:	None		ſ	
Bar Lavout:	Left, False, Too. 0, 100, 0, 0, 0, 0, 0, 0, False,, 1			-/ une
Alignment Zone:	Left			Image list
Flexible Width:	False			- Text
Vertical Anchor:	Тор			Text List
Layout Order:	0			1.000
Length:	100	E		
Padding:	[0, 0, 0, 0, 0, False]			
Output:	L]			
Manual Layout:	[False, False, , 0, , 135, , 480, , 135]			
ScaleSize:	False			
ScalePos:	False			
Begin point:	[, 0, , 135]			
🖯 X:	[, 0]			



Import images

Import images from DP code (project must not be closed as P1P to access images).

Go to Project Library and right click and choose New > Image(s).

Insure that all imported images maintain the original code settings. Such as, gauge needles must have an



Additional signal inputs

Check if there are additional signal inputs to the component, such as an enable, rotation, or position signal. Configure appropriately.

Classic Screen Editor signal inputs example

Signal inputs to the component





Vector-Based Screen Editor signal inputs example

Signal inputs to the component

KeepAspect:	True	
Layout Manager:	None	Usplay, Port
🕑 Bar Layout:	[Left, False, Top, 0, 0, 0, 0, 0, 0, False, , , ,]	
Manual Layout:	[False, False, , 92, , 103, Input.Engine_Rpm, -10	15
ScaleSize:	False	10 20
ScalePos:	False	
Insertion Point:	[, 92, , 103]	5 Zs Temp
Rotation:	[Input.Engine_Rpm, -109]	
Signal:	Input.Engine_Rpm	RPM
Constant:	-109	•) ×100 30
Width:	15	Fuel
Height:	61	
Enable:	[Input.Enable, True]	
Signal:	Input.Enable	
Constant:	True	
ID:	14	
Order:	2	
GUID:	C8D6EEC0E 06E1 483B 8759 74205BD5FEE7	

Data value formatting

There are differences between data value formatting of the Classic Screen Editor and the Vector-Based Screen Editor.

Classic Screen Editor data value formatting

Data value formatting

NP NP ND	wy 🕶 wk 🔜 ⊨©	: 🕊 💻 :	-8 👽		 9			
ID:	19	Preview font: C	Courier New 1	0 Bold (Western)				~
Path:	\\Texts\Diagnostic\							
Description:	Inputs							
Languages	Strings		Preview					
English	Inputs %d/%d	^	Inputs	8/8				
Swedish	Inputs %d/%d							
1						ОК	Cancel	Apply



Vector-Based Screen Editor data value formatting

Data value formatting

Description: Inputs				
Original Language		Preview (Width: 87p:	r; Height: 23px)	
	Copy To Clipboard	Font:	▼ Text Instance:	- Show Original
Inputs %1\$/%}\$		Inputs 0/0		
Format Add Delete First	Up Down Last	Translations		
1	(i)	-		
Type: Signed 🔻 Base: Decimal	Base Prefix			
Prefix: None Padding: None	▼ Digits: 2 😴			
Value: 0 Preview:				
2	i) 🔕			
Type: Signed 🔻 Base: Decimal	- Base Prefix			
Prefix: None Padding: None	🕶 Digits: 2 🕃			
Value: 0 Preview:				







Products we offer:

- DCV directional control valves
- Electric converters
- **Electric machines**
- **Electric motors**
- Hydrostatic motors
- Hydrostatic pumps
- Orbital motors
- PLUS+1[®] controllers
- PLUS+1[®] displays
- PLUS+1[®] joysticks and pedals
- PLUS+1[®] operator interfaces
- PLUS+1[®] sensors
- PLUS+1[®] software
- PLUS+1[®] software services, support and training
- Position controls and sensors
- PVG proportional valves
- Steering components and systems
- Telematics

Danfoss Power Solutions is a global manufacturer and supplier of high-guality hydraulic and electric components. We specialize in providing state-of-the-art technology and solutions that excel in the harsh operating conditions of the mobile off-highway market as well as the marine sector. Building on our extensive applications expertise, we work closely with you to ensure exceptional performance for a broad range of applications. We help you and other customers around the world speed up system development, reduce costs and bring vehicles and vessels to market faster.

Danfoss Power Solutions - your strongest partner in mobile hydraulics and mobile electrification.

Go to www.danfoss.com for further product information.

We offer you expert worldwide support for ensuring the best possible solutions for outstanding performance. And with an extensive network of Global Service Partners, we also provide you with comprehensive global service for all of our components.

Local address:

Danfoss **Power Solutions (US) Company** 2800 East 13th Street Ames, IA 50010, USA Phone: +1 515 239 6000

Danfoss Power Solutions GmbH & Co. OHG Krokamp 35 D-24539 Neumünster, Germany Phone: +49 4321 871 0

Danfoss **Power Solutions ApS** Nordborgvej 81 DK-6430 Nordborg, Denmark Phone: +45 7488 2222

Danfoss Power Solutions Trading (Shanghai) Co., Ltd. Building #22, No. 1000 Jin Hai Rd Jin Qiao, Pudong New District Shanghai, China 201206 Phone: +86 21 3418 5200

Danfoss can accept no responsibility for possible errors in catalogues, brochures and other printed material. Danfoss reserves the right to alter its products without notice. This also applies to products already on order provided that such alterations can be made without subsequent changes being necessary in specifications already agreed All trademarks in this material are property of the respective companies. Danfoss and the Danfoss logotype are trademarks of Danfoss A/S. All rights reserved.