

```

1 ;
2 ; -----
3 ;
4 ;   PureBasic - Common 3D functions
5 ;
6 ;   (c) 2003 - Fantaisie Software
7 ;
8 ; -----
9 ;
10
11 #WINDOW_Screen3DRequester = 0
12
13 #GADGET_FullScreen      = 1
14 #GADGET_Windowed       = 2
15 #GADGET_ScreenModesLabel = 3
16 #GADGET_WindowedModes  = 4
17 #GADGET_Launch        = 5
18 #GADGET_Cancel         = 6
19 #GADGET_Logo           = 7
20 #GADGET_Frame          = 8
21 #GADGET_ScreenModes    = 9
22
23 Global Screen3DRequester_FullScreen, Screen3DRequester_ShowStats
24
25 Procedure Screen3DRequester()
26
27   OpenPreferences("Demos3D.prefs")
28   FullScreen      = ReadPreferenceLong ("FullScreen"      , 1)
29   FullScreenMode$ = ReadPreferenceString("FullScreenMode" , "640x480")
30   WindowedScreenMode$ = ReadPreferenceString("WindowedScreenMode", "512x384")
31
32
33   If OpenWindow(#WINDOW_Screen3DRequester, 0, 0, 396, 205, "PureBasic - 3D Demos", #PB_Window_ScreenCentered | #PB_Window_SystemMenu |
34   #PB_Window_Invisible)
35
36     Top = 6
37
38     ImageGadget (#GADGET_Logo, 6, Top, 0, 0, LoadImage(0,"Data/PureBasicLogo.bmp"), #PB_Image_Border) : Top+76
39
40     Frame3DGadget(#GADGET_Frame, 6, Top, 384, 80, "", 0) : Top+20
41
42     OptionGadget(#GADGET_FullScreen, 70, Top, 100, 20, "Fullscreen") : Top+25
43     OptionGadget(#GADGET_Windowed, 70, Top, 100, 20, "Windowed") : Top-25
44
45     ComboBoxGadget (#GADGET_ScreenModes, 190, Top, 150, 21) : Top+25
46     ComboBoxGadget (#GADGET_WindowedModes, 190, Top, 150, 21) : Top+45
47
48     ButtonGadget (#GADGET_Launch, 6, Top, 180, 25, "Launch", #PB_Button_Default)
49     ButtonGadget (#GADGET_Cancel, 200, Top, 190, 25, "Cancel")
50
51     If ExamineScreenModes()
52
53       While NextScreenMode()
54
55         Width      = ScreenModeWidth()
56         Height     = ScreenModeHeight()
57         Depth      = ScreenModeDepth()
58         RefreshRate = ScreenModeRefreshRate()
59
60         If Depth > 8
61           AddGadgetItem(#GADGET_ScreenModes, -1, Str(Width)+"x"+Str(Height)+"x"+Str(Depth)+"@"+Str(RefreshRate))
62         EndIf
63
64       Wend
65
66     EndIf
67
68     ExamineDesktops()
69     NbScreenModes = 7
70
71     Restore WindowedScreenDimensions
72
73     Repeat
74       Read.l CurrentWidth
75       Read.l CurrentHeight
76
77       If CurrentWidth < DesktopWidth(0) And CurrentHeight < DesktopHeight(0)
78         AddGadgetItem(#GADGET_WindowedModes, -1, Str(CurrentWidth)+"x"+Str(CurrentHeight))
79         NbScreenModes - 1
80       Else
81         NbScreenModes = 0
82       EndIf
83     Until NbScreenModes = 0
84

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85     SetGadgetState(#GADGET_FullScreen, FullScreen)
86     SetGadgetState(#GADGET_Windowed , 1-FullScreen)
87
88     SetGadgetText (#GADGET_ScreenModes , FullScreenMode$)
89     SetGadgetText (#GADGET_WindowedModes, WindowedScreenMode$)
90
91     DisableGadget (#GADGET_ScreenModes , 1-FullScreen)
92     DisableGadget (#GADGET_WindowedModes, FullScreen)
93
94     HideWindow(#WINDOW_Screen3DRequester, 0)
95
96     Repeat
97
98         Event = WaitWindowEvent()
99
100     Select Event
101
102     Case #PB_Event_Gadget
103
104         Select EventGadget()
105
106         Case #GADGET_Launch
107             Quit = 2
108
109         Case #GADGET_Cancel
110             Quit = 1
111
112         Case #GADGET_FullScreen
113             DisableGadget(#GADGET_ScreenModes , 0)
114             DisableGadget(#GADGET_WindowedModes, 1)
115
116         Case #GADGET_Windowed
117             DisableGadget(#GADGET_ScreenModes , 1)
118             DisableGadget(#GADGET_WindowedModes, 0)
119
120         EndSelect
121
122     Case #PB_Event_CloseWindow
123         Quit = 1
124
125     EndSelect
126
127 Until Quit > 0
128
129 FullScreen = GetGadgetState(#GADGET_FullScreen)
130 FullScreenMode$ = GetGadgetText (#GADGET_ScreenModes)
131 WindowedScreenMode$ = GetGadgetText (#GADGET_WindowedModes)
132
133 CloseWindow(#WINDOW_Screen3DRequester)
134
135 EndIf
136
137 If Quit = 2 ; Launch button has been pressed
138
139     CreatePreferences("Demos3D.prefs")
140     WritePreferenceLong ("FullScreen" , FullScreen)
141     WritePreferenceString("FullScreenMode" , FullScreenMode$)
142     WritePreferenceString("WindowedScreenMode", WindowedScreenMode$)
143
144     If FullScreen
145         ScreenMode$ = FullScreenMode$
146     Else
147         ScreenMode$ = WindowedScreenMode$
148     EndIf
149
150     RefreshRate = Val(StringField(ScreenMode$, 2, "@"))
151
152     ScreenMode$ = StringField(ScreenMode$, 1, "@") ; Remove the refresh rate info, so we can parse it easily
153
154     ScreenWidth = Val(StringField(ScreenMode$, 1, "x"))
155     ScreenHeight = Val(StringField(ScreenMode$, 2, "x"))
156     ScreenDepth = Val(StringField(ScreenMode$, 3, "x"))
157
158     Screen3DRequester_FullScreen = FullScreen ; Global variable, for the Screen3DEvents
159
160     If FullScreen
161         SetRefreshRate(RefreshRate)
162         Result = OpenScreen(ScreenWidth, ScreenHeight, ScreenDepth, "3D Demos")
163     Else
164         If OpenWindow(0, 0, 0, ScreenWidth, ScreenHeight+MenuHeight(), "PureBasic - 3D Demos", #PB_Window_SystemMenu |
165 #PB_Window_ScreenCentered)
166             CreateMenu(0, WindowID(#WINDOW_Screen3DRequester))
167             MenuTitle("Project")
168             MenuItem(0, "Quit")
169
170             MenuTitle("About")
171             MenuItem(1, "About...")
172
173             Result = OpenWindowedScreen(WindowID(#WINDOW_Screen3DRequester), 0, 0, ScreenWidth, ScreenHeight, 0, 0, 0)
174         EndIf
175     EndIf
176 EndIf
177
178 ProcedureReturn Result
179 EndProcedure
180
181

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182 Procedure Screen3DEvents()
183
184   If Screen3DRequester_FullScreen = 0 ; Handle all the events relatives to the window..
185
186     Repeat
187       Event = WindowEvent()
188
189       Select Event
190
191         Case #PB_Event_Menu
192           Select EventMenu()
193
194             Case 0
195               Quit = 1
196
197             Case 2
198               MessageRequester("Info", "Windowed 3D in PureBasic !", 0)
199
200           EndSelect
201
202         Case #PB_Event_CloseWindow
203           Quit = 1
204
205       EndSelect
206
207       If Quit = 1 : End : EndIf ; Quit the app immediately
208     Until Event = 0
209
210   EndIf
211
212   If ExamineKeyboard()
213     If KeyboardReleased(#PB_Key_F1)
214       Screen3DRequester_ShowStats = 1-Screen3DRequester_ShowStats ; Switch the ShowStats on/off
215     EndIf
216   EndIf
217 EndProcedure
218
219
220
221 Procedure Screen3DStats()
222   If Screen3DRequester_ShowStats
223     ; Nothing printed for now
224   EndIf
225 EndProcedure
226
227
228
229
230 DataSection
231   WindowedScreenDimensions:
232     Data.l 320, 240
233     Data.l 512, 384
234     Data.l 640, 480
235     Data.l 800, 600
236     Data.l 1024, 768
237     Data.l 1280, 1024
238     Data.l 1600, 1200
239 EndDataSection
240
241 ; IDE Options = PureBasic 4.31 (Windows - x86)
242 ; CursorPosition = 142
243 ; FirstLine = 131
244 ; Folding = --
245 ; Markers = 85,182
246 ; EnableXP
247 ; EnableCompileCount = 0
248 ; EnableBuildCount = 0
249 ; EnableExeConstant

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