



Navigator Outline

```

PTP_PKA
  in cyto with initial #molecules = 0
PTP_PP
R2C2
  in cyto with initial #molecules = 120
45 Reactions
R2C2_cyto, G_GDP@cyto -> G_a_s@cyto
v01b, iso_BAR@cyto_mem + G_a_s@cyto + bg@cyto -> iso_BAR
v01f, iso_BAR_C@cyto_mem -> iso_BAR@cyto_mem + G_a_s@cyto
v02, cAMP@cyto + $PDE4_P@cyto -> AMP@cyto
v03, B_Raf_active@cyto + $PP2A@cyto -> B_Raf@cyto
v04b, iso_BAR@cyto_mem -> iso@extra + BAR@cyto_mem
v04f, iso@extra + BAR@cyto_mem -> iso_BAR@cyto_mem
v05, cAMP@cyto + $PDE4@cyto -> AMP@cyto
v06b, GRK_bg@cyto -> bg@cyto + GRK@cyto
v06f, bg@cyto + GRK@cyto -> GRK_bg@cyto
v07, $MEK_active@cyto + MAPK@cyto -> MAPK_active@cyto
v08, $PKA@cyto + B_Raf@cyto -> B_Raf_active@cyto
v09, $AC_active@cyto_mem + ATP@cyto -> cAMP@cyto
v10f, G_a_s@cyto -> G_GDP@cyto
v11b, G_protein@cyto -> G_GDP@cyto + bg@cyto
v11f, G_GDP@cyto + bg@cyto -> G_protein@cyto
v12b, iso_BAR_C@cyto_mem -> G_protein@cyto + iso_BAR@cy
  
```

Problems Error Log

0 errors, 1 warning, 0 others

Description	Resource
Warnings (1 item)	
Definition declared but not used.	cell_shape_03June.biopepa

Writable

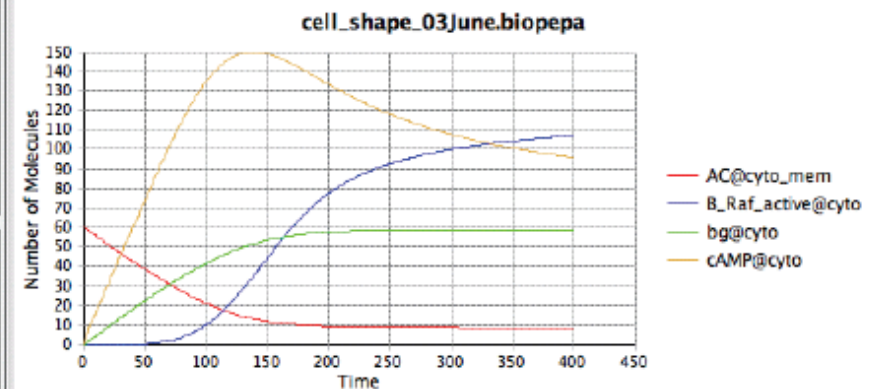
cell\_shape\_03June.bi transportation.biope 3

```

PDE_high_km = v14 (+) PDE_high_km@cyto ;
cAMP = v09 >> cAMP@cyto + v17 >> cAMP@cyto + v02 << cAMP@cyto +
v05 << cAMP@cyto + v13f << cAMP@cyto + v13b >> cAMP@cyto +
v14 << cAMP@cyto + v18f << cAMP@cyto + v18b >> cAMP@cyto +
v23f << cAMP@cyto + v23b >> cAMP@cyto + v32f << cAMP@cyto +
v32b >> cAMP@cyto ;
PTP_PP = v28 (+) PTP_PP@cyto ;
PDE4_P = v20 >> PDE4_P@cyto + v27 << PDE4_P@cyto + v02 (+) PDE4_P ;
MAPK_active_fraction = MAPK_active@cyto / (MAPK@cyto + MAPK_active@cyto) ;
MAPK_Pathway ::= B_Raf@cyto[120] <*> B_Raf_active@cyto[0] <*> MEK@cyto[108] <*>
MEK_active@cyto[0] <*> MAPK@cyto[217] <*> MAPK_active@cyto[0] <*>
PP2A@cyto[60] <*> PTP@cyto[120] <*> PTP_PKA@cyto[0] <*> PTP
  
```

Graph View Rename Detach Close Export to PNG Export to CSV

Figure 1



Insert 1:1