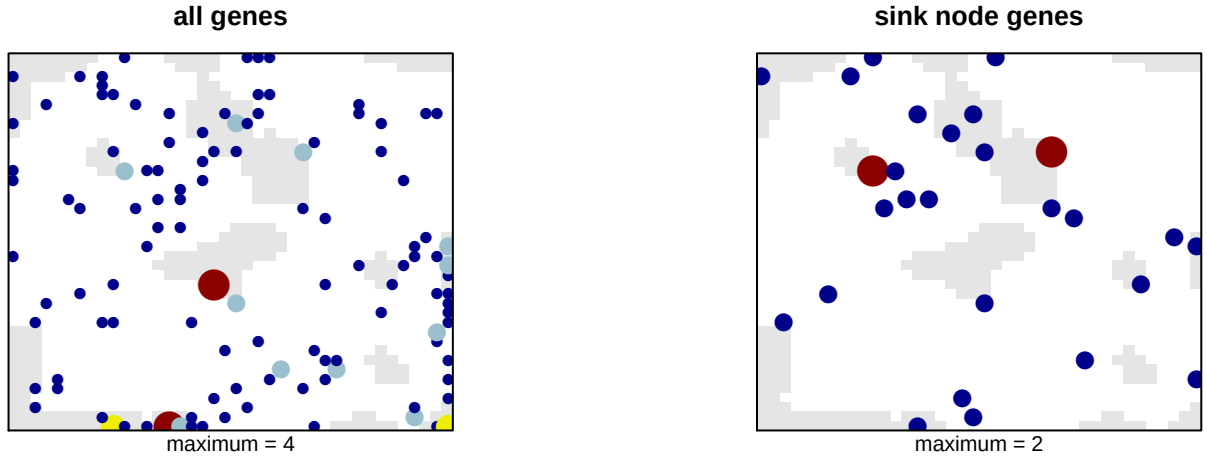
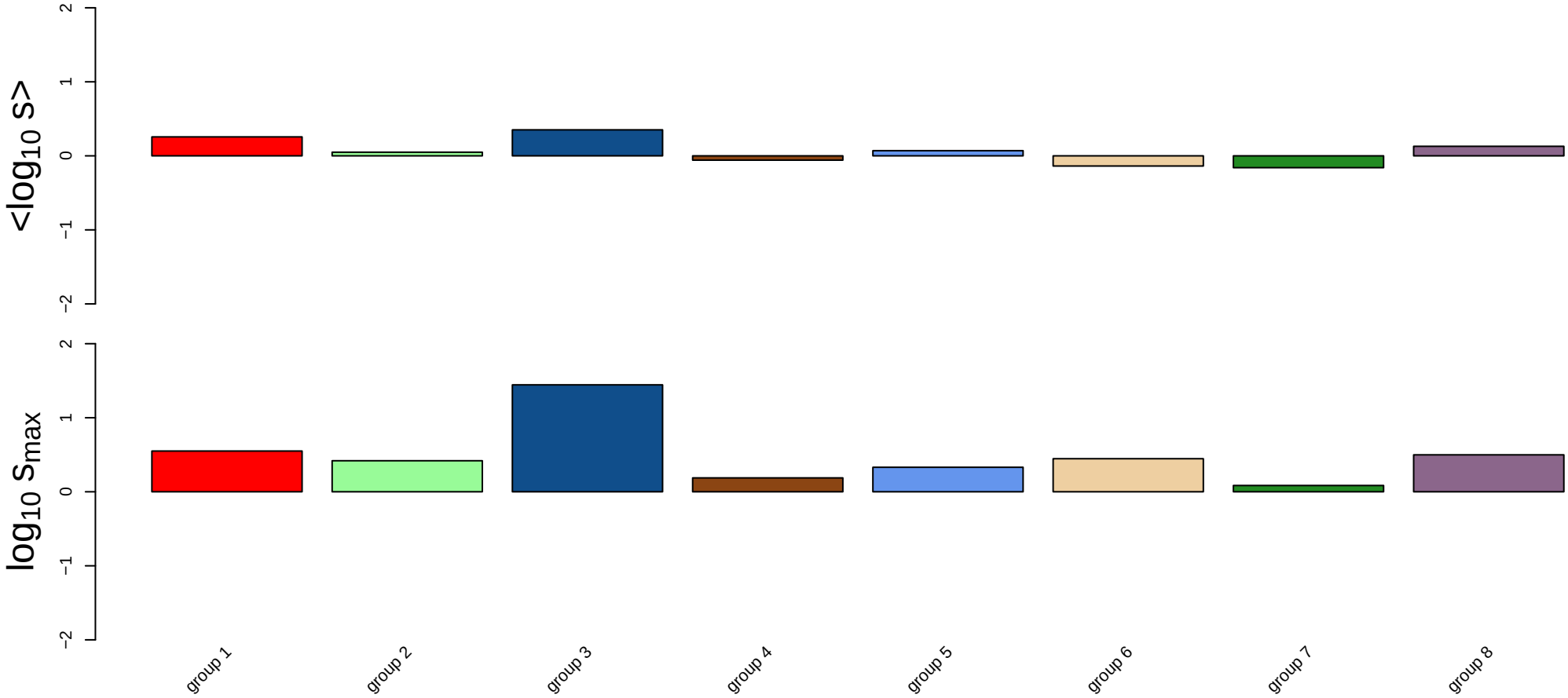
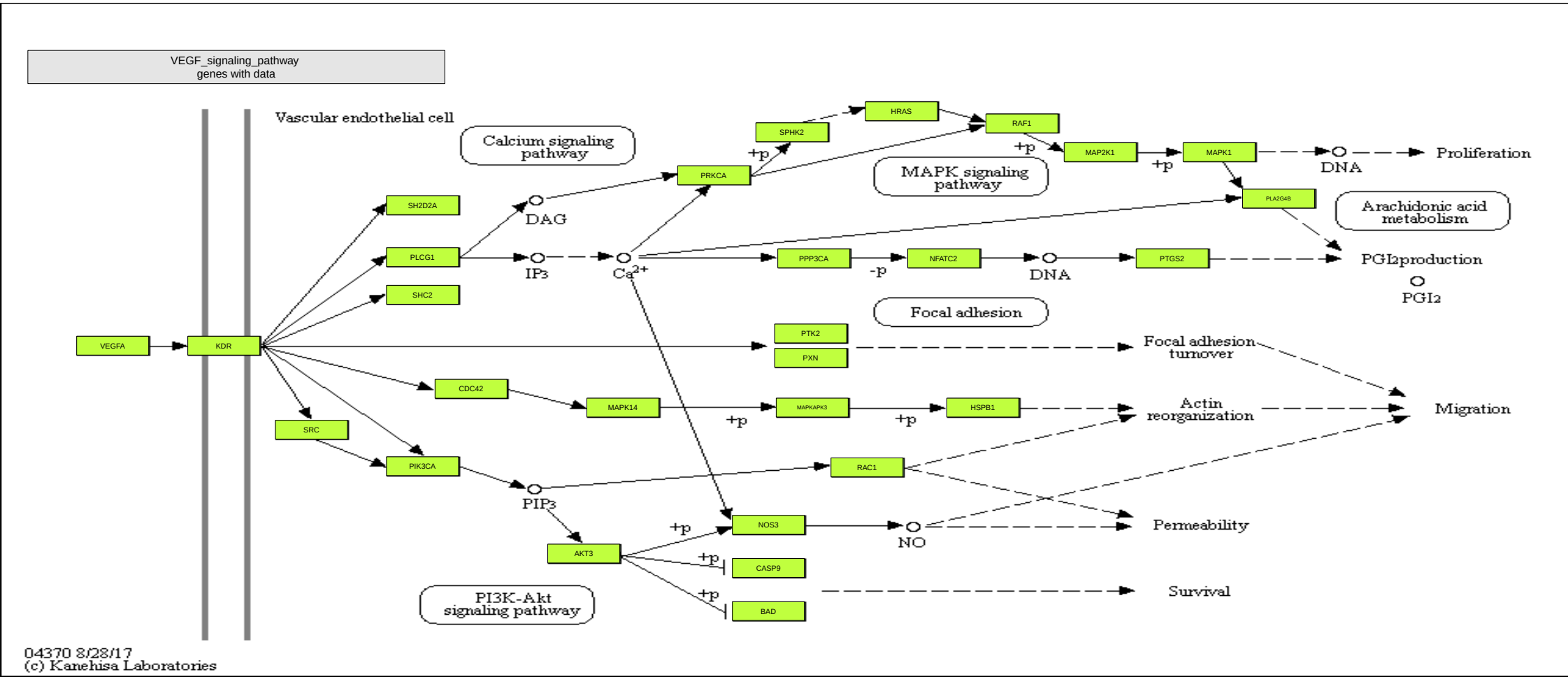
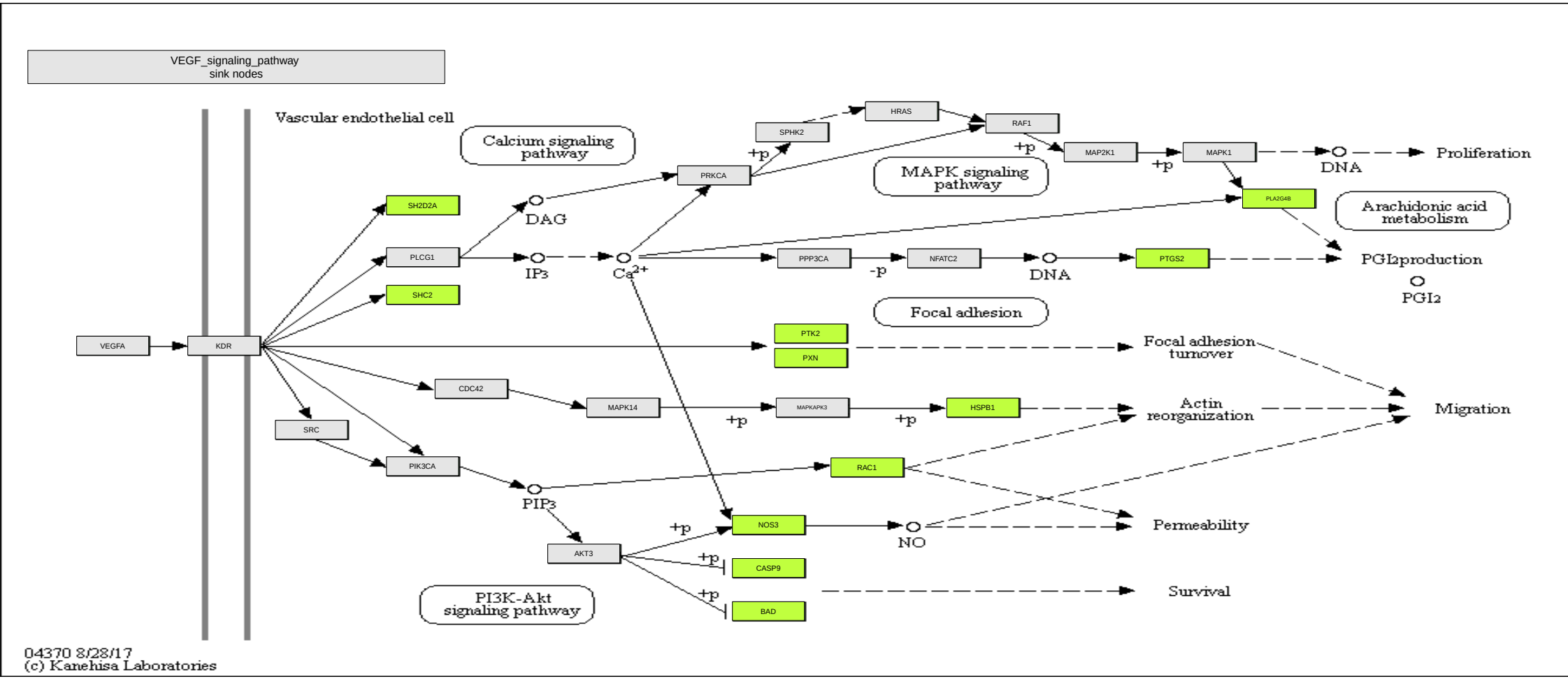
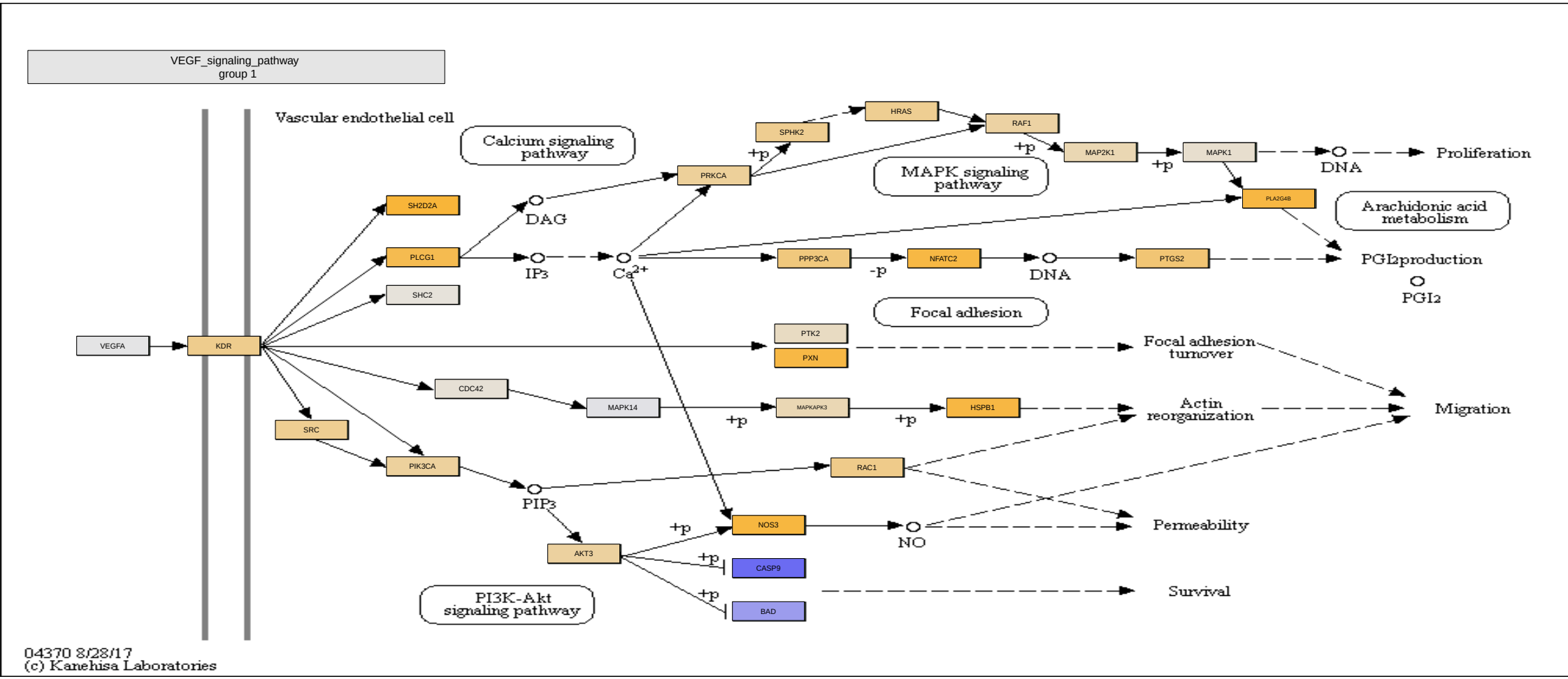
VEGF signaling pathway

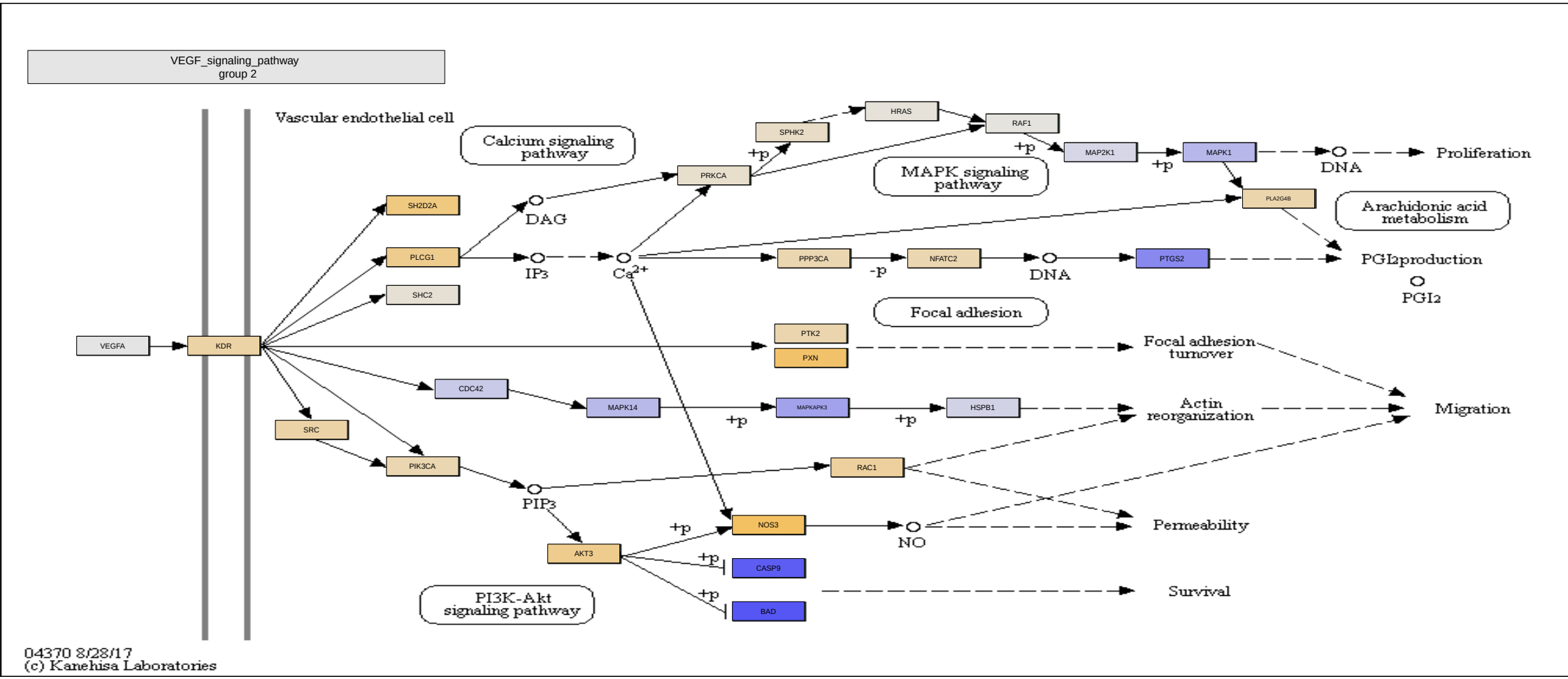


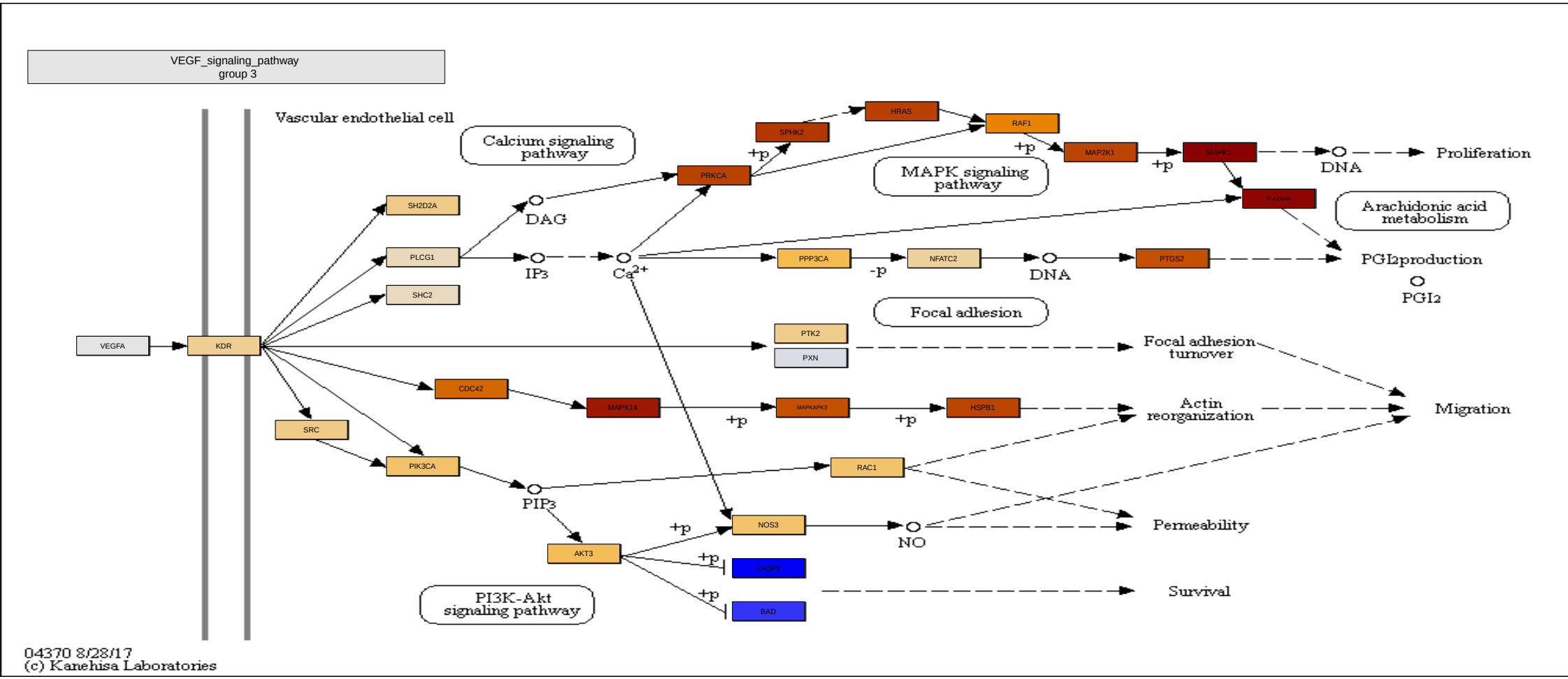


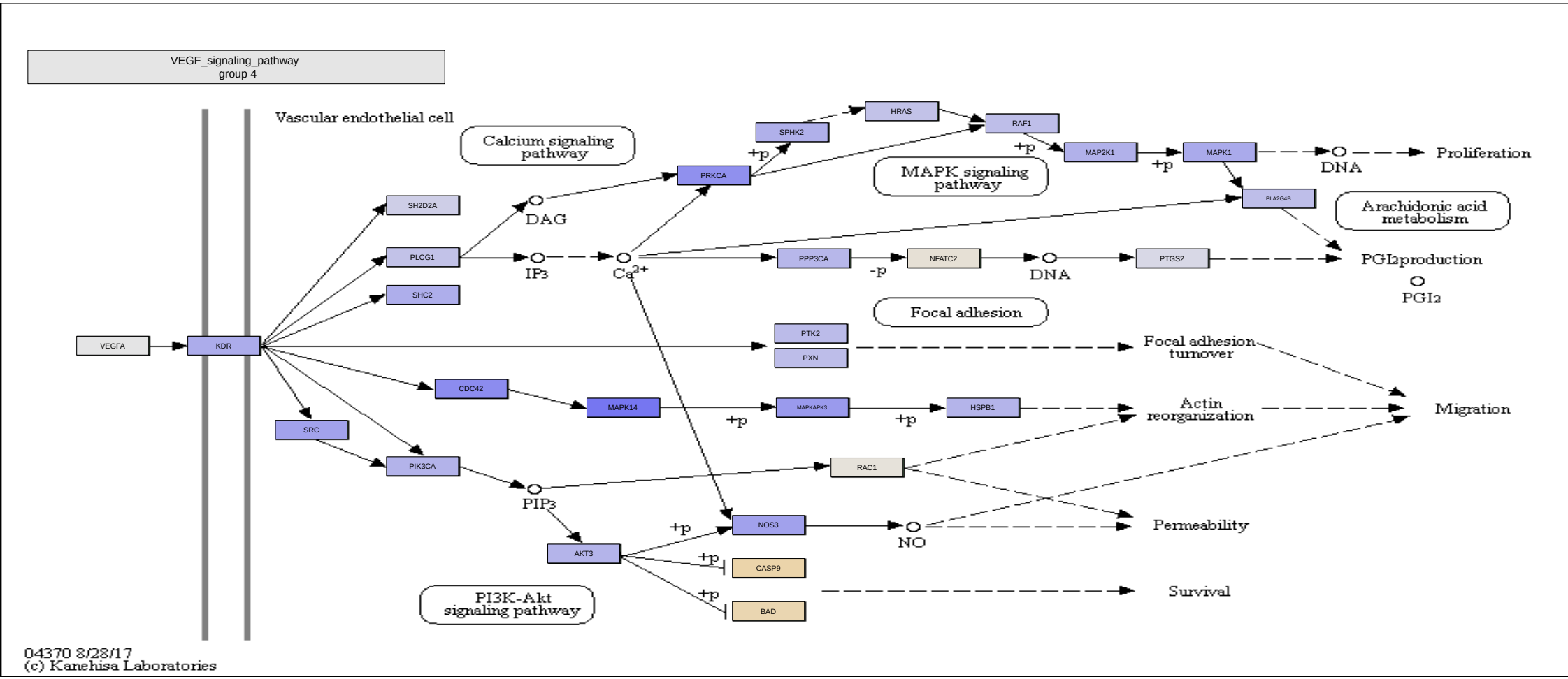

VEGF_signaling_pathway
genes with data
Vascular endothelial cell
Calcium signaling pathway
MAPK signaling pathway
Arachidonic acid metabolism
Focal adhesion
PI3K-Akt signaling pathway
VEGFA
KDR
SH2D2A
PLCG1
SHC2
SRC
PIK3CA
CDC42
PRKCA
SPHK2
HRAS
RAF1
MAP2K1
MAPK1
PLA2G4B
PPP3CA
NFATC2
PTGS2
PTK2
PXN
MAPK14
MAPKAPK3
HSPB1
RAC1
NOS3
AKT3
CASP9
BAD
DAG
IP3
Ca2+
PIP3
NO
DNA
PGI2production
PGI2
Proliferation
Focal adhesion turnover
Actin reorganization
Migration
Permeability
Survival
+p
-p
04370 8/28/17
(c) Kanehisa Laboratories

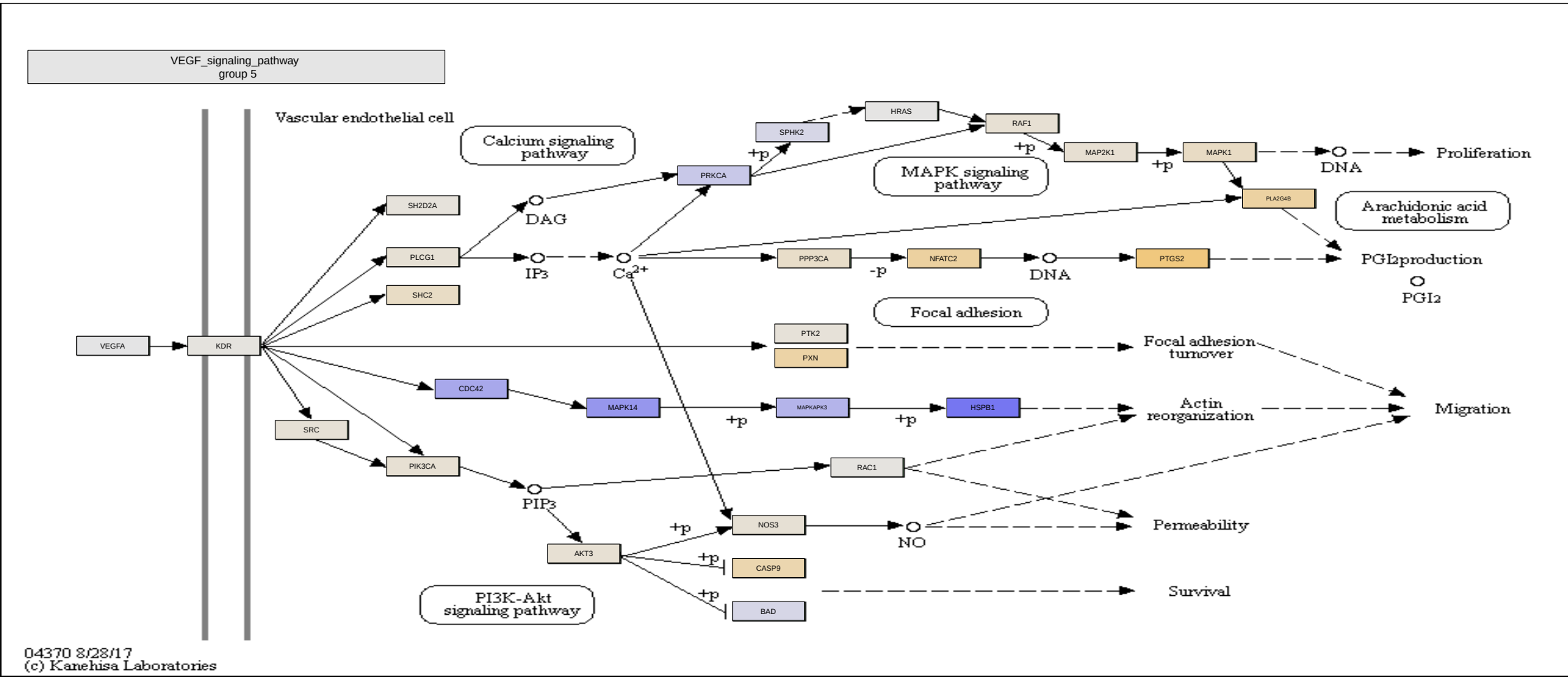

VEGF_signaling_pathway
sink nodes
Vascular endothelial cell
Calcium signaling pathway
MAPK signaling pathway
Arachidonic acid metabolism
Focal adhesion
PI3K-Akt signaling pathway
VEGFA
KDR
SH2D2A
PLCG1
SHC2
SRC
PIK3CA
CDC42
PRKCA
SPHK2
HRAS
RAF1
MAP2K1
MAPK1
PLA2G4B
PPP3CA
NFATC2
PTGS2
PTK2
PXN
MAPK14
MAPKAPK3
HSPB1
RAC1
NOS3
AKT3
CASP9
BAD
DAG
IP3
Ca2+
PIP3
NO
DNA
PGI2production
PGI2
Proliferation
Focal adhesion turnover
Actin reorganization
Migration
Permeability
Survival
+p
-p
04370 8/28/17
(c) Kanehisa Laboratories

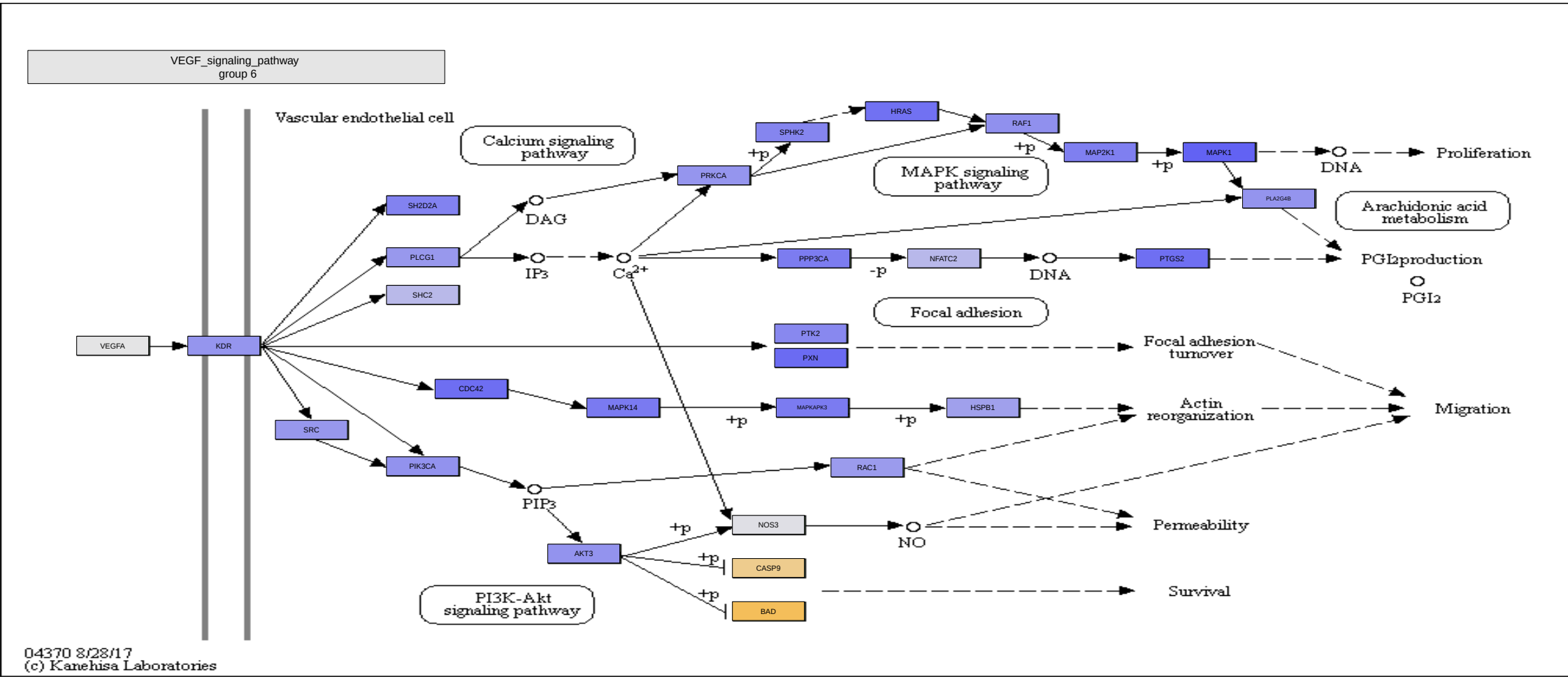

VEGF_signaling_pathway
group 1
Vascular endothelial cell
Calcium signaling pathway
MAPK signaling pathway
Arachidonic acid metabolism
Focal adhesion
PI3K-Akt signaling pathway
VEGFA
KDR
SH2D2A
PLCG1
SHC2
SRC
PIK3CA
CDC42
MAPK14
MAPKAPK3
HSPB1
PTK2
PXN
SPHK2
PRKCA
HRAS
RAF1
MAP2K1
MAPK1
PLA2G4B
PPP3CA
NFATC2
PTGS2
NOS3
AKT3
CASP9
BAD
RAC1
DAG
IP3
Ca2+
PIP3
NO
DNA
PGI2production
PGI2
Proliferation
Focal adhesion turnover
Actin reorganization
Migration
Permeability
Survival
+p
-p
04370 8/28/17
(c) Kanehisa Laboratories

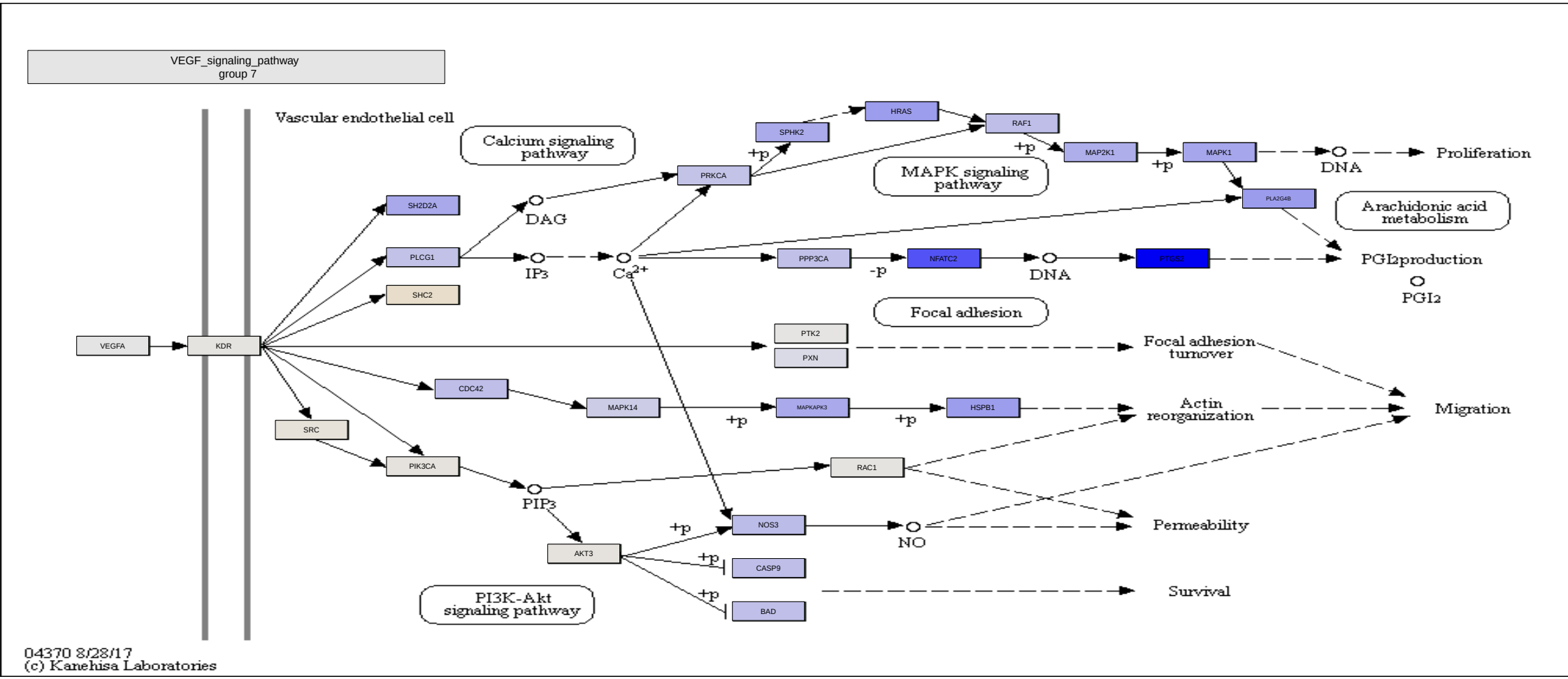

VEGF_signaling_pathway
group 2
Vascular endothelial cell
Calcium signaling pathway
MAPK signaling pathway
Arachidonic acid metabolism
Focal adhesion
PI3K-Akt signaling pathway
VEGFA
KDR
SH2D2A
PLCG1
SHC2
SRC
PIK3CA
CDC42
PRKCA
SPHK2
HRAS
RAF1
MAP2K1
MAPK1
PLA2G4B
PPP3CA
NFATC2
PTGS2
PTK2
PXN
MAPK14
MAPKAPK3
HSPB1
RAC1
NOS3
AKT3
CASP9
BAD
DAG
IP3
Ca2+
PIP3
NO
DNA
PGI2production
PGI2
Proliferation
Focal adhesion turnover
Actin reorganization
Migration
Permeability
Survival
+p
-p
04370 8/28/17
(c) Kanehisa Laboratories

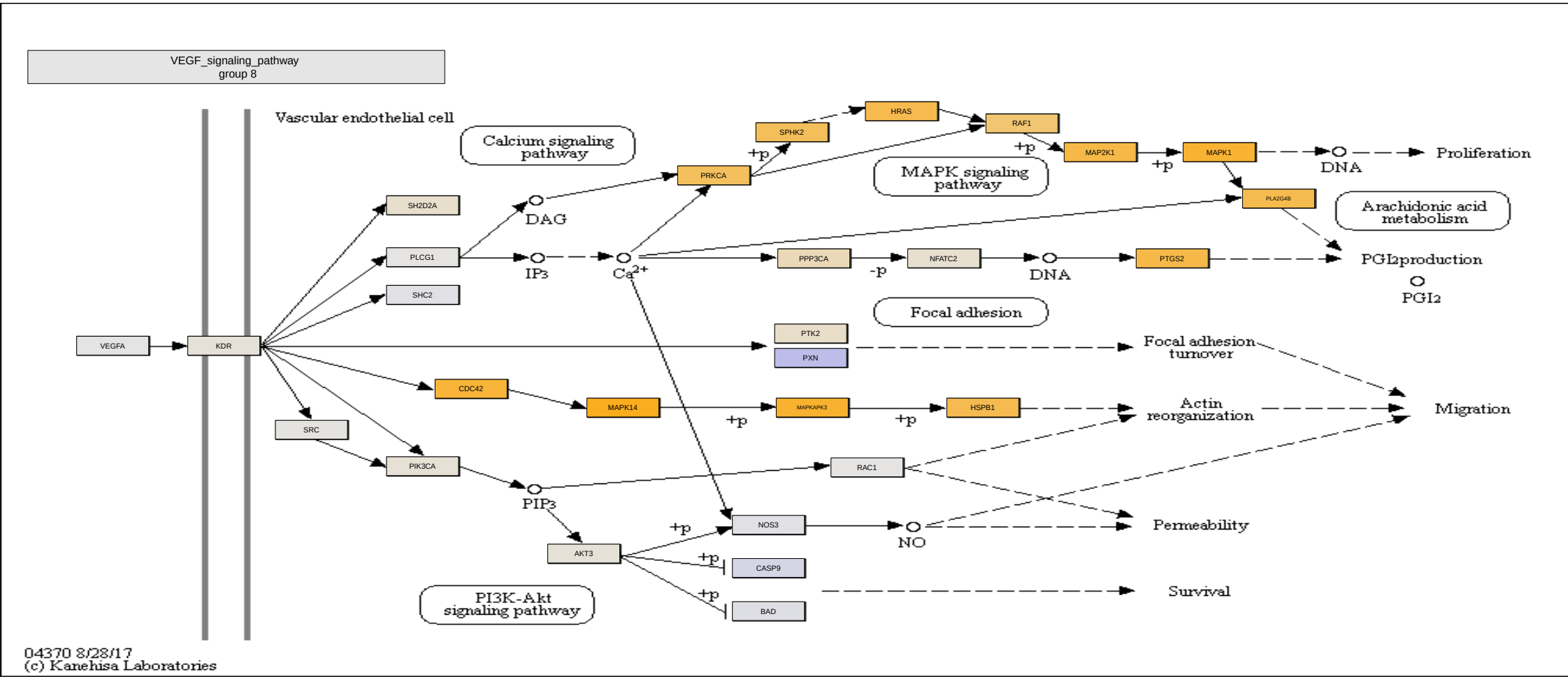

VEGF_signaling_pathway
group 3
Vascular endothelial cell
Calcium signaling pathway
MAPK signaling pathway
Arachidonic acid metabolism
Focal adhesion
PI3K-Akt signaling pathway
VEGFA
KDR
SH2D2A
PLCG1
SHC2
SRC
CDC42
PIK3CA
SPHK2
PRKCA
HRAS
RAF1
MAP2K1
MAPK1
PLA2G4B
DAG
IP3
Ca2+
PPP3CA
NFATC2
PTGS2
DNA
Proliferation
PGI2production
PGI2
PTK2
PXN
Focal adhesion turnover
MAPK14
MAPKAPK3
HSPB1
Actin reorganization
Migration
RAC1
PIP3
NOS3
NO
Permeability
AKT3
CASP9
BAD
Survival
+p
-p
04370 8/28/17
(c) Kanehisa Laboratories


VEGF_signaling_pathway
group 4
Vascular endothelial cell
Calcium signaling pathway
MAPK signaling pathway
Arachidonic acid metabolism
Focal adhesion
PI3K-Akt signaling pathway
VEGFA
KDR
SH2D2A
PLCG1
SHC2
SRC
CDC42
PIK3CA
PRKCA
SPHK2
HRAS
RAF1
MAP2K1
MAPK1
PLA2G4B
PPP3CA
NFATC2
PTGS2
PTK2
PXN
MAPK14
MAPKAPK3
HSPB1
RAC1
NOS3
AKT3
CASP9
BAD
DAG
IP3
Ca2+
PIP3
NO
DNA
PGI2production
PGI2
Proliferation
Focal adhesion turnover
Actin reorganization
Migration
Permeability
Survival
+p
-p
04370 8/28/17
(c) Kanehisa Laboratories


VEGF_signaling_pathway
group 5
Vascular endothelial cell
Calcium signaling pathway
MAPK signaling pathway
Arachidonic acid metabolism
Focal adhesion
PI3K-Akt signaling pathway
VEGFA
KDR
SH2D2A
PLCG1
SHC2
DAG
IP3
Ca2+
PRKCA
SPHK2
HRAS
RAF1
MAP2K1
MAPK1
DNA
Proliferation
PLA2G4B
PPP3CA
NFATC2
PTGS2
PGI2production
PGI2
PTK2
PXN
Focal adhesion turmover
CDC42
MAPK14
MAPKAPK3
HSPB1
Actin reorganization
Migration
SRC
PIK3CA
PIP3
RAC1
NOS3
NO
Permeability
AKT3
CASP9
BAD
Survival
+p
-p
04370 8/28/17
(c) Kanehisa Laboratories


VEGF_signaling_pathway
group 6
Vascular endothelial cell
Calcium signaling pathway
MAPK signaling pathway
Arachidonic acid metabolism
Focal adhesion
PI3K-Akt signaling pathway
VEGFA
KDR
SH2D2A
PLCG1
SHC2
SRC
CDC42
PIK3CA
PTK2
PXN
SPHK2
PRKCA
HRAS
RAF1
MAP2K1
MAPK1
PLA2G4B
PPP3CA
NFATC2
PTGS2
MAPK14
MAPKAPK3
HSPB1
RAC1
NOS3
AKT3
CASP9
BAD
DAG
IP3
Ca2+
PIP3
NO
DNA
PGI2production
PGI2
Proliferation
Focal adhesion turnover
Actin reorganization
Migration
Permeability
Survival
+p
-p
04370 8/28/17
(c) Kanehisa Laboratories


VEGF_signaling_pathway
group 7
Vascular endothelial cell
Calcium signaling pathway
MAPK signaling pathway
Arachidonic acid metabolism
Focal adhesion
PI3K-Akt signaling pathway
VEGFA
KDR
SH2D2A
PLCG1
SHC2
SRC
CDC42
PIK3CA
PTK2
PXN
SPHK2
PRKCA
HRAS
RAF1
MAP2K1
MAPK1
MAPK14
MAPKAPK3
HSPB1
PLA2G4B
PPP3CA
NFATC2
PTGS2
NOS3
AKT3
CASP9
BAD
RAC1
DAG
IP3
Ca2+
PIP3
NO
DNA
PGI2production
PGI2
Proliferation
Focal adhesion turnover
Actin reorganization
Migration
Permeability
Survival
+p
-p
04370 8/28/17
(c) Kanehisa Laboratories


VEGF_signaling_pathway
group 8
Vascular endothelial cell
Calcium signaling pathway
MAPK signaling pathway
Arachidonic acid metabolism
Focal adhesion
PI3K-Akt signaling pathway
VEGFA
KDR
SH2D2A
PLCG1
SHC2
SRC
PIK3CA
CDC42
PRKCA
SPHK2
HRAS
RAF1
MAP2K1
MAPK1
PLA2G4B
DAG
IP3
Ca2+
PPP3CA
NFATC2
PTGS2
DNA
Proliferation
PGI2production
PGI2
PTK2
PXN
Focal adhesion turnover
MAPK14
MAPKAPK3
HSPB1
Actin reorganization
Migration
RAC1
PIP3
NOS3
NO
Permeability
AKT3
CASP9
BAD
Survival
+p
-p
04370 8/28/17
(c) Kanehisa Laboratories