Table S1. KEGG categories and respective enriched genes regulated by Ang II at 3 hours interval

KEGG category	Up-regulated Genes
MAPK signaling pathway	Mapk1, Cdc25b, Akt1, Kras, Map2k4, Mapkapk2, Mecom, Map2k5, Ppp3r1, Elk1, Rras, Ppp5c, Gna12
Chemokine signaling pathway	Shc3, Mapk1, Akt1, Kras, Cxcl10, Cxcl12, Gnai3, Prex1, Gnb2
Regulation of actin cytoskeleton	Mapk1, Apc, Kras, Myl9, Rras, Fgd1, Pdgfc, Gna12, Git1
Tight junction	Akt1, Kras, Magi3, Gnai3, Myl9, Inadl, Rras, Pard6b, Llgl1
ErbB signaling pathway	Shc3, Mapk1, Akt1, Kras, Map2k4, Elk1, Nck2
Neurotrophin signaling pathway	Shc3, Mapk1, Akt1, Kras, Mapkapk2, Map2k5, Sh2b1
Ubiquitin mediated proteolysis	Keap1, Ube2e3, Pias1, Mgrn1, Klhl13, Anapc10, LOC68922
Insulin signaling pathway	Shc3, Mapk1, Akt1, Kras, Elk1, Rhoq
Chronic myeloid leukemia	Shc3, Mapk1, Akt1, Kras, Mecom, E2f1
Cell cycle	Cdc25b, Mcm5, Mcm6, Tfdp2, Anapc10, E2f1
Glioma	Shc3, Mapk1, Akt1, Kras, E2f1
VEGF signaling pathway	Mapk1, Akt1, Kras, Mapkapk2, Ppp3r1
Gap junction	Mapk1, Kras, Gnai3, Map2k5, Pdgfc
KEGG category	**Down-regulated Genes**
Protein processing in endoplasmic reticulum	Stub1, Ganab, Bag1, Tram1, Ckap4, Man1b1, Wfs1
Axon guidance	Sema3c, Nfat5, Efn4, Ephb6, Unc5a, Slit1
ECM-receptor interaction	Lama5, Cd47, Col1a1, Col5a3
TGF-beta signaling pathway	Ep300, Gdf7, Ltbp1, Tgfb2
PPAR signaling pathway	Dbi, Slc27a4, Scd4, Slc27a1
mTOR signaling pathway	Rps6ka2, Ins1, Tsc2
Notch signaling pathway	Ep300, Ncstn, Psen2
Aldosterone-regulated sodium reabsorption	Ins1, Prkca, Scnn1a
N-Glycan biosynthesis	Ganab, Alg11, Man1b1

Table S2. Biological processes (GO) and respective enriched genes regulated by Ang II at 3 hours interval

Biological Process	Up-regulated Genes
cell cycle	Apc, Ccng1, Nucks1, Rab11b, Sept9, Rgs2, Mapk1, Cdc25b, Cgref1, Mecom, Thap1, Specc1l, Ankrd54, Lzts, E2f1, Pdcd6ip
cell division	Cdc25b, Ccng1, Gnai3, Specc1l, LZts2, Pdcd6ip, Sept9
cell growth	Akt1, Cxcl12, Map2k5, Taf9
protein transport	Nutf2, Sec13, Atp6v1e1, Ipo9, Chchd4, Pex5, Chmp1a, Pdcd6ip, Exoc5, Ykt6, Atp6v1a, Rab11b
intracellular signal transduction	Shc3, Mapk1, Akt1, Def8, Dnmbp, PRerx1, Blnk, Grb15,Sh2b1
small GTPase mediated signal transduction	Mapk1, Kras, Rnd2, Rras, Arl6, Rab11b, Rhoq, Gnai3, Gfm2, Gna12
protein folding	Fkbp4, Ranbp2, Ppil4, Dnajc11, Ptges3, Grpel1, St13
protein ubiquitination / polyubiquitination	Akt1, Mgrn1, Klhl13, Rnf187, Zfp364, March2, Ube2e3, Ube2v1, Mgrn1, Rnf187, LOC689226
actin cytoskeleton organization	Kras, Fhl3, Fgd1, Llgl1, Cap1, Rhoq
MyD88-dependent toll-like receptor signaling pathway	Mapk1, Map2k4, Mapkapk2, Ube2v1, Elk1
Wnt receptor signaling pathway	Wif1, Apc, Ldb1, Lzts2
response to DNA damage stimulus	Mapk1, Apc, Apbb1, Paxip1, Obfc2b
response to ionizing radiation	Cxcl10, Vcam1, Paxip1, Obfc2b
Biological Process	**Down- regulated Genes**
ion transport	Steap3, Tmem37, Scnn1a, Kcnh3, Kcnk3, Gabrd, Slc22a18, Cacna1i, Slc22a23, Slc12a6
brain development	Ptprg, Dbi, Cdk5rap1, Nkx2-1, Cdk5rap2, Kcnk3, Bcr, Slc7a11, Slit1, Hrh3
protein transport	Steap3, Aagab, Dnm2, Mcoln1, Cox18, Apoc2, Col1a1, Lca5, Tram1, Psen
heart development	Rps6ka2, Sox9, Ep300, Gja1, Tsc2, Oxt, Sema3c, Sox18, Tgfb2
negative regulation of cell proliferation	Sox9, Gja1, Grm4, Igfbp3, Prkca, Tsc2, Serpine2, S2f7, Tgfbp2
negative regulation of apoptosis	Sox9, Grm4, Bag1, Cln8, Tex11, Psen2, Tgfb2, Wfs1
response to hypoxia	Ep300, Pnmt, Tsc2, Kcnk3, Agtrap, Adsl, Psen2, Tgfbp2
axon guidance	Gdf7, Nkx2-1, Neurog2, Unc5a, Slit1, Tgfb2
protein folding	Ganab, Bag1, RGD1565752, Dnajc17, Fxbp10, Man1b1
negative regulation of cell growth	Dnajc2, Serpine2, Ndufa13, Slit1, Tgfb2
cell migration	Lama5, Cd47, Lamb1, Mdk, Tgfb2

Table S3. KEGG categories and respective enriched genes regulated by Ang II at 6 hours interval

KEGG category	Up-regulated Genes
Cell cycle	Chek2, Ccna2, Bub1b, Ccnb1, Ywhaq, Skp2, Smc3, Mcm4, Hdac1, Anapc1, Stag2, Cdc7, MGC112830, Anapc10, Cdk2, Cdc26, Cdkn2c, Cdkn2d, Cdc20
Pathways in cancer	Mapk1, Smo, Ctbp1, Skp2, Hdac1, Pias1, Stk36, Col4a2, Cdk2, Tcf7, Mapk9, Ccdc6, Grb2, Mlh2, Sos2
RNA transport	Nup107, Eif4e, Eif4a1, Thoc3, Ncbp1, Pabpc4, Sumo1, RGD1306195, Nup205, Eif4e2, Gemin7, Sumo2, Thoc4
MAPK signaling pathway	Mapk1, Mapk4k3, Hspa8, Hspa1l, Ntf4, Map2k4, Pak2, Elk1, Mapk9, Chp, Grb2, Sos2
Focal adhesion	Mapk1, Capn2, Pak2, Vcl, Col4a2, Elk1, Vasp, Itga8, Mapk9, Grb2, Sos2
Insulin signaling pathway	Mapk1, Eif4e, Elk1, Eif4e2, Prkag2, Mapk9, Calm2, Grb2, Sos2
Protein processing in endoplasmic reticulum	Nploc4, Hspa8, Hspa1l, Hsph1, Capn2, Man1a2, Ube2j2, Mapk9, Eif2ak2
Spliceosome	Hspa8, Hspa1l, Thoc3, Snrpd1, Ncbp1, lsm6, Pcbp1, Plrg1, Thoc4
Ubiquitin mediated proteolysis	Skp2, Ube2q1, Ube2j2, Pias1, Anapc1, Anapc10, Ube2l3, Cdc26, Cdc20
Proteasome	Psme3, Pomp, Psma1, Psmd14
ErbB signaling pathway	Mapk1, Map2k4, Pak2, Abl2, Elk1, Mapk9, Grb2, Sos2
Neurotrophin signaling pathway	Mapk1, Ywhaq, Ntf4, Nfkbie, Mapk9, Calm2, Grb2, Sos2
p53 signaling pathway	Chek2, Ccnb1, Ei24, Cdk2, Zmat3
Adherens junction	Mapk1, Yes1, Vcl, Ctnnd1, Tcf7
Chronic myeloid leukemia	Mapk1, Ctbp1, Hdac1, Grb2, Sos2

KEGG category	Down-regulated Genes
Parkinson's disease	Cox6a2, Cyc2, Ndufs2, Ube2g2, Ube2l6, Ndufa12, Ndufa6, Ndufv3, Ndufa3
Mineral absorption	Slc31a1, Slc39a3, Slc26a6, Hmox2
Cytosolic DNA-sensing pathway	Ripk3, Ifna4, RGD1562552, Polr3g
Pantothenate and CoA biosynthesis	Coasy, Ppcs, Enpp3
Protein export	Srp19, Srpr, Sec61g
Riboflavin metabolism	Acp5, Enpp3

Table S4. Biological processes (GO) and respective enriched genes regulated by Ang II at 6 hours interval

Biological Process	Up-regulated Genes
protein phosphorylation	Chek2, Nek2, Wnk1, Mapk1, Cdk5, Map4k3, Camk1, Cdk12, YEs1, Ccnb1, Dyrk1a, Map2k4, Pak2, Sgk1, Tbk1, Lrrk2, Stk36, Abl2, Pxk, Mst4, Nek6, Spag9, Cdc7, Vrk1, Cdk2, Pik3r4, Mapk9, Eif2ak2
negative regulation of apoptosis	Dffa, Il6r, Serbp1, Glp1r, Smo, Fnta, Accn1, Fignl1, Gata6, Hells, Htt, Skp2, Sgk1, Hdac1, Apbb2, Serpinb9, Pea15a, Taf9, Rtn4, Twist1
positive regulation of apoptosis	Dffa, Cdk5, Aldh1a3, Map2k4, Gata6, Skp2, Ing4, Sav1, Apbb2, RGD1309922, Top2a, Mapk9, Eif2ak2
proteasomal ubiquitin-dependent protein catabolic process	Bub1b, Ccnb1, Psme3, Ube2v2, Psmd5, Psma1, lrrk2, Sumo1, Fbxl5, Psmd14, Anapc1, Anapc10, Trim13, Cdc26, Taf9, Cdc20, Ppp2r5c, Gipc1
negative regulation of cell proliferation	Phb2, Cd9, Igfbp5, Tinf2, Ing4, Hdc1, Sav1, Lrrk2, Brip1, Cdkn2c, Eif2ak2, Dlc1, Slc9a3r1, Mfn2, Inppl1, Ppp2r5c
cell cycle	Ccna2, Clasp2, Mapk1, Cdk5, Kif2c, Smc3, Arhgef2, Nek6, Spast, Cdk2, Cdc26, Calm2, Cdc20, Mlh1
cell division	Ccna2, Clasp2, Cdk5, Kif2c, Ccnb1, Smc3, Arhgef2, nek6, Top2a, Spast, Cdk2, Cdc26, Cdc20, Top1
nervous system development	Myo1b, Camk1, Dyrk1a, Accn1, Ube2v2, Dpf3, Lrrk2, Ophn1, Spast, Kctd11, LOC606294, Rtn4, Nrn1, Ppp1r9b
DNA repair	Polk, Wrnip1, Ube2v2, Polq, Fbxo18, Rbbp8, Fto, Smc3, Pole, Rev3l, Recql, Rnf168, Mlh1, Parg
actin cytoskeleton organization	Cdk5, Mk1, Sipa1l1, Coro1b, Capzb, Abl2, Ophn1, Ehd2, Vasp, Dlc1, Slc9a3r1, Cap1, Capza1
DNA replication	Wrnip1, Map2k4, Polq, Mcm4, Ing4, Pole, Rev3l, Recql, Cdc7, Cdk2, Helb, Top1
protein ubiquitination	Rnf34, Skp2, Rnf2, Fbxl5, Anapc1, Anapc10, Rfws3, Ube2l3, Trim13, Cdc26, Rnf168, Ccnb1, Psme3, Psmd5, Psma1, lrrk2, Psmd14, Tbc1d7, Cdc20
mitosis	Clasp2, Kif2c, Ccnb1, Jtb, Smc3, Arhgef2, Nek6, Cdk2, Cdc26, Cdc20
RNA splicing	Cdk13, Snrpd1, Cd2bp2, Ncbp1, Hnrnpa2b1, Srek1, Plrg1, Thoc4, Polr2f

Biological Process	Down- regulated Genes
apoptosis	Psmd9, Acsbg1, Ripk3, Prkcb, Cycs, Aqp2, Ncstn, Psmg2, Actc1, Fastk, Arhgef4, Ciapin1, Plekhf1, Trim39, Traf2, Aen, Itgb3bp, Scrip, Pdcd2, Dapk3, Aifm1, Plg
protein transport	Pgap2, Arfgap1, Abra, Vps36, Snx17, Rabif, Chmp2b, Chmp7, Efcab4b, Arfgap3, Gorasp1, Vps33b, Pex14, Snap23, Scamp2, Vps25, LOC681989, Fxc1, Rab27b, Sec31a
intracellular protein transport	Vamp1, Abra, Ipo4, Napg, Ipo7, Srpr, Snupn, Tom1l2, Tom1, Sar1a, Xpo5, Scamp2, LOC683402
protein ubiquitination	Zfp91, Ube2g2, Rnf146, Uhrf2, Traf2, Tri32, Klhl21, Cbll1, Mdm2, Ube3a, Herc6, Anapc13
ubiquitin-dependent protein catabolic process	Usp2, Usp4, Usp15, Rnf146, Uhrf2, Trim32, Mdm2, Ube3a, Herc6, Usp48
response to oxidative stress	Abcc1, Coq7, Cycs, Ndufs2, Ndufa12, Ppp1r15b, Lias, Ndufa6, Hmox2
vesicle-mediated transport	Arfgap1, Vamp1, Sar1a, Vamp4, Arfgap3, Vps33b, Snap23, LOC683402, Sec31a
protein targeting	Optn, Srp19, Strada, Mdm2, Srpr, Xpo5, Pmpcb, Pex14, Fxc1
positive regulation of cell migration	Abcc1, Acp5, Trim32, Cbll1, Srpx2, Cxcl16, Ager, Vegfa
cytoskeleton organization	Cdc42bpa, Uxt, Bbs4, Tekt4, Tubgcp2, MAST1, Ablim2, Trpv4, Rhoq

Table S5. KEGG categories and respective enriched genes regulated by Ang II via AT1 receptor at 3 hours interval

KEGG category	Up-regulated Genes
Metabolic pathways	Ndst2, Hsd17b1, B3gnt1, Polrf3f, Etnk1, Rdh12, Chpf, Pigu, Alg11, Alg9, Rfk, Rpe
Lysosome	Mcoln1, Aga, Abca2
Acute myeloid leukemia	Myc, Rps6kb2
Steroid hormone biosynthesis	Sts, Hsd17b1
N-Glycan biosynthesis	Alg11, Alg9
KEGG category	**Down-regulated Genes**
Cell cycle	Chek2, Cdc25b, Rp53, Anapc5, Mcm5, Smc1a
p53 signaling pathway	Chek2, Tp53, Tsc2
Amino sugar and nucleotide sugar metabolism	Gale, Amdhd2, Gmppa
beta-Alanine metabolism	Acadm, Aldh2
Propanoate metabolism	Acadm, Aldh2
Glycine, serine and threonine metabolism	Shmt2, Gcat
Vasopressin-regulated water reabsorption	Dctn6, Dynll1
DNA replication	Mcm5, Pola1

Table S6. Biological processes (GO) and respective enriched genes regulated by Ang II via AT1 receptor at 3 hours interval

Biological Process (GO)	Up-regulated Genes
protein transport	Lman1, Unc50, Mcoln1, Tram1, Atg9a
positive regulation of apoptosis	Jak2, Myc, Tlr4, Stk4
steroid metabolic process	Lcat, Sts, Hsd17b1, Scap
inflammatory response	Tnfrsf1b, Tnfrsf4, Tlr4, Jak, Ccl24, Zyx, Cd276
tumor necrosis factor-mediated signaling pathway	Tnfrsf1b, Jak2, Tnfrsf4
positive regulation of cell migration	Jak2, Ccl24, Lamb1
intracellular protein kinase cascade	Jak2, Stk4

Biological Process (GO)	Down-regulated Genes
cell cycle / division and mitosis	Cdc25b, Avpi1, Ppp1c, Anapc5, Kifc1, Mtus1, RGD1306730, Smc1a, Arl2, Mlh1
regulation of cell cycle	Cdc37, Tp53, Tsc2, Bop1
DNA repair	Fbxo18, Kctd13, Smc1a, Mlh1, Pola1
carbohydrate metabolic process	Gale, Ppp1c, Amdhd2, Chst5
protein homooligomerization	Acadm, Tsc2, Kctd13, Shmt2
cell migration	Bcar1, Kctd13, Gsk3a, Bambi
negative regulation of signal transduction	Tsc2, Erbb3, Gsk3a, Rfng
DNA damage response, signal transduction resulting in induction of apoptosis	Chek2, Tp53, Mlh1
circadian rhythm	Nfil3, Erbb3, Arntl
insulin receptor signaling pathway	Eif4ebp1, Bcar1, Gsk3a
anaphase-promoting complex-dependent proteasomal ubiquitin-dependent protein catabolic process	Psmd9, Psme3, Anapc5
neuroblast proliferation	Tp53, Racgap1, Sox2
TOR signaling cascade	Eif4ebp1, Tsc2
positive regulation of epithelial to mesenchymal transition	Wwtr1, Bambi
cytokinesis	Incenp, Racgap1
Rho protein signal transduction	Kctd13, Cdc42ep1
negative regulation of Wnt receptor signaling pathway	Tsc2, Sox2

Table S7. KEGG categories and respective enriched genes regulated by Ang II via AT1 receptor at 6 hours interval

KEGG category	Up-regulated Genes
RNA transport	Eif4e, Ube2i, Pop4, Nup35, Gemin6, Pigz, Gemin2
Cell cycle	Chek1, Ccne1, Cdc45, Mad2l1, Gadd45b
Peroxisome	Pxmp4, Pex19, Eci2, Pex11b
Pyrimidine metabolism	Uck1, Cmpk2, Polr3k, Polr3gl
p53 signaling pathway	Chek1, Ccne1, Gadd45b
Proteasome	Psmb9, Psbm4, Psmb1
Riboflavin metabolism	Acp5, Acp6
Homologous recombination	Rad54b, Rpa2
RNA polymerase	Polr3k, Polr3gl

KEGG category	Down-regulated Genes
Focal adhesion	Bcar1, Ptk2, Itgb4, Pak1, Myl9, Flnb, Itgb6, Actn4, Vegfa
Regulation of actin cytoskeleton	Bcar1, Ptk2, Itgb4, Pak1, Myl9, Itgb6, Iqgap1, Actn4
Chemokine signaling pathway	Plcb1, Stat3, Bcar1, Ptk2, Pak1, Gngt2
Lysosome	Ctsh, Cdig2, Gga2, Ctsa, Abcb9
Axon guidance	Ptk2, Pak1, Sema3c, Sema3f, Slit2
PPAR signaling pathway	Acsl1, Scd4, LOC681458, Gk
Adherens junction	Smad2, Ssx2ip, Iqgap1, Actn4
Aminoacyl-tRNA biosynthesis	Aars, Farsb, Wars
Biosynthesis of unsaturated fatty acids	Scd4, LOC681458
Vitamin digestion and absorption	Tcn2, Cubn

Table S8. Biological processes (GO) and respective enriched genes regulated by Ang II via AT1 receptor at 6 hours interval

Biological Process (GO)	Up-regulated Genes
protein ubiquitination	Psmb9, Arrb2, Ube2i, Ube2t, Psmb4, Rnf168, Psmb1, Arrb2, Mad2l1, Birc5
proteasomal ubiquitin-dependent protein catabolic process	Psmb9, Arrb2, Ube2i, Mad2l1, Jkamp, Psmb4, Psmb1
mitotic cell cycle	Eif4e, Psmb9, Mad2l1, Psmb4, Birc5, Psmb1
DNA repair	Chek1, Gen1, Alkbh2, Rpa2, Rnf168
regulation of cell growth	Cd44, Exosc9, Ccdc85b, Ulk1, Zfp639
cell division	Ube2i, Ccne1, Cdc45, Spast, Birc5
cellular process involved in reproduction	Sep15, Arrb2, Nkx2-1, Syt6, Zfp639
cell cycle process	Psmb9, Mad2l1, Psmb4, Birc5, Psmb1
response to peptide hormone stimulus	Prss8, Aqp2, Prlh, Birc5

Biological Process (GO)	Down-regulated Genes
signal transduction	Chd4, Cdh13, Grin2c, Ngfr, Il1rl1, Itpr3, Xpr1, Aars, Srebf2, Arhgap28, Fert2, Scara5, Ngf, Iqgap1, Vapb, Arhgap10
cell differentiation	Egr2, Klf4, Sox9, Ngfr, Plcb1, Ptk2, Jag1, Clip3, Cd276, Slit2, Zmiz1, Sohlh1, Srf, Ascl1, Dhh
response to organic substance	Abcc4, Cdh13, Stat3, Acsl1, Fosl1, Ptk2, Sdc2, Smad2, Pak1, Srebf2, Ngf, Slit2, Pea15a, Hspd1, GK
regulation of cell proliferation	Nrg1, Sox9, Abcc4, Cdh13, Ngfr, Irs1, Ptk2, Ngf, Zmiz1, Sox4, Apln, Nolc1, Vegfa, Nr2f2, Klf4, Jag1
negative regulation of apoptosis	Nrg1, Sox9, Cdh13, Ngfr, Dnajb9, Ptk2, Lrp1, Ngf, Pea15a, Sox4, Hspd1, Ascl1, Vegfa
response to stress	Adh5, Ubqln1, Dnajb9, Sdc2, Aars, Pak1, Scara5, Sox4, Vapb, Actn4, Hspd1, Gk, Vegfa
regulation of signal transduction	Klf4, Avpi1, Cdh13, Ngfr, Irs1, Jag1, Smad2, Pak1, Ngf, Sulf2, Slit2, Ascl1, Vegfa
cell surface receptor linked signaling pathway	Plcb1, Spn, Stat3, Acsl1, Bcar1, Gfra1, Il1rap, Il1rl1, Itgb4, Fcgr2b, Itgb6, Slit2
cell adhesion	Nrg1, Cdh13, Bcar1, Ptk2, Itgb4, Fert2, Pcdh9, Ssx2ip, Itgb6, Omd

Table S9. KEGG categories and respective enriched genes regulated by Ang II via AT2 receptor at 3 hours interval

KEGG category	Up-regulated Genes
Purine metabolism	Gucy1b2, Pfas, Polr2i
Steroid hormone biosynthesis	Ugt1a6, Cyp1b1
Retinol metabolism	Ugt1a6, Dhrs3
Metabolism of xenobiotics by cytochrome P450	Ugt1a6, Cyp1b1
Drug metabolism - other enzymes	Ugt1a6, Ces2a
N-Glycan biosynthesis	Ganab, Man1c1

KEGG category	Down-regulated Genes
Pathways in cancer	Pik3ca, Itgb1, Myc, Prkca, Fgf9, Axin2, Hdac1, Cbl, Birc5, Sos2
MAPK signaling pathway	Dusp6, Myc, Prkca, Fgf9, Rasa1, Pak2, Ppp3r1, Rras, Sos2
Regulation of actin cytoskeleton	Ppp1r12a, Pik3ca, Itgb1, Fgf9, Pak2, Itga4, Rras, Sos2
ErbB signaling pathway	Pik3ca, Myc, Prkca, Hbegf, Areg, Pak2, Cbl, Sos2
Focal adhesion	Ppp1r12a, Pik3ca, Itgb1, Prkca, Pak2, Itga4, Sos2
Axon guidance	Itgb1, Rasa1, Pak2, Ppp3r1
VEGF signaling pathway	Pik3ca, Prkca, Ppp3r1

Table S10. Biological processes (GO) and respective enriched genes regulated by Ang II via AT2 receptor at 3 hours interval

Biological process (GO)	Up-regulated Genes
cell differentiation	Igfbp3, Gpsm1, Ggn, Sox18, Lrp6, Nr0b1, Mdk
angiogenesis	Ecm1, Cyp1b1, Ccl24, Sox18, Pnpla6
response to peptide hormone stimulus	Ugt1a6, Pnmt, Lrp6, Nr0b1
embryo development	Foxn3, Ccno, Foxj2, Fzd2
regulation of sequence-specific DNA binding transcription factor activity	Lrp6, Foxn3, Foxj2, Nr0b1
vasculature development	Cypb1, Sox18, Fzd2
canonical Wnt receptor signaling pathway	Lrp6, Fzd2, Bambi

Biological process (GO)	Down-regulated Genes
cell differentiation	Dusp6, Bzw2, Fgf9, Snai2, Rasa1, Axin2, Areg, Ppp3r1, Rora, Runx2, Sh2b3, Fhl2, Ctgf, Dhh
negative regulation of apoptosis	Pik3ca, Myc, Serbp1, Rasa1, Zc3hc1, Hdac1, Api5, Pea15a, Cbl, Birc5, Pim3
positive regulation of cell proliferation	Itgb1, Myc, Prkca, Hbegf, Fgf9, Areg, Hdac1, Etv5, Aggf1, Runx2, Ctgf
ossification	Mmp13, Fgf9, Snai2, Axin2, Areg, Impad1, Nab2, Runx2, Fhl2, Ctgf
negative regulation of cell proliferation	Gtpbp4, Itgb1, Prkca, Emd, Eif2ak1, Axin2, Hdac1, Eif2ak2
cell adhesion	Cdh17, Itgb1, Rasa1, Tnfrsf12a, Aggf1, Itga4, Ctgf, Cdhr1
canonical Wnt receptor signaling pathway	Emd, Fgf9, Snai2, Axin2, Hdac1, Lats2, Cyld
regulation of signal transduction	Dusp6, Zfp91, Prkca, Fgf9, Slc7a1, Hdac1, Runx2
regulation of cell proliferation	Myc, Prkca, Hbegf, Emd, Fgf9, Etv5, Eif2ak2
aging	Lonp1, Prkca, Eno3, Canx, Ctgf, Tfrc
dephosphorylation	Dusp6, Ppp1r12a, Acp2, Ppp3r1, Impad1, Pdp1
regulation of mitotic cell cycle	Myc, Cyld, Brd4, Birc5, Pim3, LOC690728

Table S11. KEGG categories and respective enriched genes regulated by Ang II via AT2 receptor at 6 hours interval

KEGG category	Up-regulated Genes
Peroxisome	Phyx, Pex19, Paox, Crot, Mlycd
mTOR signaling pathway	Cab39l, Eif4b, Ulk1, Rps6kb2, Pgf
Cytosolic DNA-sensing pathway	Nfkbia, Mavs, Ikbke, Polr2e
Sphingolipid metabolism	Sphk1, Galc, Ppap2a
SNARE interactions in vesicular transport	Vamp1, Vamp4, Stx8

KEGG category	Down-regulated Genes
MAPK signaling pathway	Dusp6, Bndf, Hspa8, Ppp3ca, Prkca, Gadd45a, Mapkapk2, Pak1, Mecom, Dusp16, Rapgef2, Ngf, Rps6ka5, Rras2, Max, Stk3
Pathways in cancer	Cdk6, Pik3ca, Prkca, Stat5b, Arnt, Igf1r, E2f3, Skp2, Mecom, Pias1, Traf3, Rad51, Max, Bid, Ccdc6
Focal adhesion	Pik3ca, Prkca, Bcar1, Igf1r, Capn2, Mylk3, Pak1, Myl9, Vcl, Dock1, Myl12b, Ccnd2
Regulation of actin cytoskeleton	Pik3ca, Bcar1, Myh9, Mylk3, Pak1, Myl9, Vcl, Dock1, Rras2, Myl12b, Nckap, Msn
Cell cycle	Cdk6, Cdc25a, Gadd45a, E2f3, Skp2, Ccna, Mcm4, Cdc6, Anapc10, Ccnd2, Mad1l1
Neurotrophin signaling pathway	Pdk1, Pik3ca, Bdnf, Camk2d, Irs1, Mapkapk2, Ngf, Rps6ka5, Sh2b3
RNA transport	Eif4ebp1, Eif4e, Eif4a1, Nup93, Eif3a, Tmem48, Eif5, Pigz, Nup98
ErbB signaling pathway	Eif4ebp1, Pik3ca, Camk2d, Prkca, Stat5b, Hbegf, Pak1
p53 signaling pathway	Cdk6, Serpine1, Gadd45a, Ei24, Ccnd2, Bid
Glioma	Cdk6, Pik3ca, Camk2d, Prkca, Igf1r, E2f3
Apoptosis	Cflar, Pik3ca, Ppp3ca, Capn2, Ngf, Bid
Progesterone-mediated oocyte maturation	Pik3ca, Cdc25a, Igf1r, Ccna1, Anapc10, Mad1l1
Ribosome biogenesis in eukaryotes	Cirh1a, Mphosph10, Utp15, Heatr1, Xrn2, Gar1
mTOR signaling pathway	Eif4ebp1, Eif4e, Pik3ca, Prkaa1
Circadian rhythm - mammal	Npas2, Csnk1e, Csnk1d, Bhlhe40
Steroid biosynthesis	Hsd17b7, Nsdhl, Soat1

Table S12. Biological processes (GO) and respective enriched genes regulated by Ang II via AT2 receptor at 6 hours interval

Biological Process (GO)	Up-regulated Genes
positive regulation of cell proliferation	Sphk1, Il11, Casr, Erbb2, Stat5a, Ccnb1, Rogdi, Cd47, Myd88, Tbx18, Sox4, Cyba
protein transport	Dnajc14, Exoc3, Dnm2, Mcoln1, Nutf2, Tmed3, Duoxa1, Chmp1a, Gorasp1, Psen2, Sec16b
brain development	Stxbp3, Sphk1, Dmbx1, Tmem57, Bbc3, Fzd1, Tulp3, Cdk5rap3, Sharpin, Synj2
regulation of cell proliferation	Sphk1, Ndrg2, Erbb2, Mitf, Nfkbia, Ifi30, Creb3, Myd88, Cyba
vesicle-mediated transport	Stxbp3, Vamp1, Sar1a, Vamp4, Chmp1a, Stx8, Sec16b
inflammatory response	Sphk1, Lipa, Cyp4f5, Map2k3, Lias, Cyba
cell surface receptor linked signaling pathway	Erbb2, Fcer1g, Cd47, Myd88, Itga10, Plxnb1
I-kappaB kinase/ NF-kappaB cascade	Nfkbia, Ltbr, Myd88, Mavs, Ikbke, Sharpin
chromatin modification	Apbb1, Suv420h2, Smarcal1, Smarcd2
innate immune response	Myd88, Sp110, Mavs, Cyba
response to stress / oxygen levels	Ccnb1, Ndrg1, Bbc3, Asl

Biological Process (GO)	Down-regulated Genes
protein phosphorylation	Nek2, Cdk6, Pdk1, Pik3ca, Cdk12, Prkca, Igf1r, Mapkpk2, Mylk3, Pak1, Lmtk2, Lats2, Mast4, Pdik1l, Rps6ka5, MSt4, Nek7, Vrk2, Riok3, Mdfic, Epha2, Bmx, Gsk3a, Csnk1e, Csnk1d, Stk3, Prkaa1, Hipk2, Plk2
signal transduction	Stat5b, Il1rl1, Ahr, Rtkn, Ngf, Asap1, Traf3, Siva1, Syde1, Rras2, Stard13, Gsk3a, Pdpn, Ramp2, Arhgap17, Stk3, Arhgap10, Akap12, Gnb5, Plk2, Hmga2, Bpm7
apoptosis	SIah2, Hip1, Ahr, Nlrp3, Rtkn, Ngf, Fam82a, Nlrp1a, Bag4, Aen, Siva1, Pea15a, Epha2, Dap, Bid, Stk3
protein transport	Stxb1, Myh9, Abra, Nup93, Lmtk2, Ipo9, RUfy1, Tmem48, Rab6b, Pex14, Timm10, Vps45, Arf2, Nup98, Sec31a
negative regulation of apoptosis	Cflar, Pik3ca, Bdnf, Stat5b, Igf1r, Skp2, Btg2, Rtkn, Ngf, Ndufaf4, Siva1, Pea15a, Hipk3, Rtn4, Cat, Serpine1, Accn1, Cd44, Nes, Fignl1, Btg2, Ung, Tfap4, Wfs1, Bmp7
response to organic cyclic compound	Dusp6, Bdnf, Eno2, Prkca, Cd44, Ahr, Homer1, Btg2, Ngf, Atf1, Ctgf, Ccdnd2
regulation of cell proliferation	Cdk6, Serpine1, Prkca, Stat5b, Hbgef, Plcd3, Skp2, Mecom, Atp2b1, Mfn2, Bid, Rbpj
cell cycle	Cdk6, Siah2, Cdc25a, Ppp6c, Ahr, Spc25, Ccdc99, Thap1, Specc1l, Pdpn, Rgs2

response to estrogen stimulus	Eno2, Serpine1, Prkca, Stat5b, Ahr, Rbbp5, Ramp2, Ctgf, Ccnd2, Bid, Bmp7
DNA replication	Rfc2, Cdc25a, Kctd13, Mcm4, Clspn, Pole, Blm, Cdc6, Ctgf, Nup98
regulation of apoptosis	Cflar, Hip1, Mllt11, Deptor, Mst4, Traf3, Pea15a, Bid, Wfs1
nervous system development	Bdnf, Hbgef, Nes, Kat2a, Fnbp1l, Epha2, Slc7a5, Pdpn, Bhlhe40, Rtn4
response to stress	Bdnf, Cat, Hspa8, Serpine1, ppp3ca, Ahr, Homer1, Rps6ka5, Pdpn, Ctgf
cell division	Cdc5a, Ccna1, Spc25, Ccdc99, Top2a, Cdc6, Specc1l, Ccnd2