

## Supplementary Data

SUPPLEMENTARY TABLE S1. POLYMERASE CHAIN REACTION PRIMER SEQUENCES

<i>Gene name</i>	<i>Forward primer</i>	<i>Reverse primer</i>
<i>Slc5a5</i>	CGCTGCTTGTGTTGGACATTTTTC	CCCAGAGCCCCGTAATAGAGATAG
<i>Actb</i>	AGCCATGTACGTAGCCATCC	TGTGGTGGTGAAGCTGTAGC
<i>Nkx2-1</i>	ACCTTACCAGGACACCATGC	TACTTCTGCTGCTTGAAGCG
<i>Foxe1</i>	ATGTACGCCGGGTAGGTGGA	CAGCTACATCGCACTCATCG
<i>Pax8</i>	CCATGGCTGTGTAAGCAAGA	GTTGCGTCCCAGAGGTGTAT
<i>Slc26a4</i>	TGCTGACTTCATTGCTGGGTTAC	AATCCAGAGAAGACGTTGCTTATCC

SUPPLEMENTARY TABLE S2. GENES REGULATED UNDER PROPYLTHIOURACIL TREATMENT

<i>Gene name</i>	<i>Synonym</i>	<i>Fold change</i>	<i>Description</i>
<b>Upregulated genes</b>			
<i>Slc5a5</i>	<i>Nis</i>	5.66	Solute carrier family 5 (sodium/iodide symporter), member 5
<i>Csn1s2a</i>	<i>Csng</i>	5.37	Casein alpha s2-like A
<i>Nxn1</i>	<i>Txnl6</i>	3.81	Nucleoredoxin-like 1
<i>Me1</i>	<i>MOD1</i>	3.75	Malic enzyme 1, NADP(+)-dependent, cytosolic
<i>Bhlhe22</i>	<i>Bhlhb5</i>	3.35	Basic helix-loop-helix family, member e22
<i>Gpr50</i>	<i>H9</i>	3.25	G protein-coupled receptor 50
<i>Gcg</i>	<i>GLP-1</i>	3.06	Glucagon
<i>Vash2</i>	<i>RGD1564105</i>	2.98	Vasohibin 2
<i>E2f1</i>	—	2.94	E2F transcription factor 1
<i>Tfrc</i>	<i>Trfr</i>	2.76	Transferrin receptor
<i>Cdc6</i>	—	2.76	Cell division cycle-6 homolog ( <i>S. cerevisiae</i> )
<i>Sla</i>	<i>Slap1</i>	2.75	src-like adaptor
<b>Downregulated genes</b>			
<i>Krtap14l</i>	<i>Krtap14</i>	0.11	Similar to keratin-associated protein 13-1
<i>Cryab</i>	<i>AACRYA</i>	0.18	Crystallin, alpha B
<i>Defb1</i>	—	0.18	Defensin-beta 1
<i>Skint4</i>	<i>RGD1566327</i>	0.23	Similar to Butyrophilin subfamily 1 member A1 precursor (BT)
<i>Olr88</i>	—	0.25	Olfactory receptor Olr88
<i>Sat1l</i>	<i>RGD1565932</i>	0.29	Similar to spermidine/spermine N1-acetyl transferase
<i>LOC688997</i>	—	0.29	Similar to Spetex-2F protein
<i>Gprc5a</i>	<i>MGC156777#Rai3</i>	0.3	G protein-coupled receptor, family C, group 5, member A
<i>Sorc1</i>	—	0.32	Similar to SORCS receptor 1
<i>RGD1565209</i>	—	0.32	Similar to kinesin family member 25 isoform 1
<i>Plau</i>	<i>MGC124931#UPAM</i>	0.33	Plasminogen activator, urokinase
<i>RGD1563747</i>	—	0.34	Similar to double homeobox, 4

SUPPLEMENTARY TABLE S3. GENES REGULATED UNDER METHIMAZOLE TREATMENT

Gene name	Synonym	Fold change	Description
Upregulated genes			
<i>RGD1564344</i>	—	11.1	Similar to CDNA sequence BC027344
<i>Nqo1</i>	<i>Dia4#MGC93075</i>	4.12	NAD(P)H dehydrogenase, quinone 1
<i>Hyal5</i>	<i>MGC108951</i>	4.03	Hyaluronoglucosaminidase 5
<i>Olr35</i>	—	3.81	Olfactory receptor 35
<i>Aox1</i>	—	3.74	Aldehyde oxidase 1
<i>Pcdh8</i>	<i>Arcadlin</i>	3.24	Protocadherin 8
<i>Pir</i>	<i>MGC109484</i>	3.03	Pirin (iron-binding nuclear protein)
<i>Me1</i>	<i>MOD1</i>	2.66	Malic enzyme 1, NADP(+)-dependent, cytosolic
<i>Sdf211</i>	—	2.63	Stromal cell-derived factor 2-like 1
<i>Osgin1</i>	<i>Ok138</i>	2.57	Oxidative stress-induced growth inhibitor 1
<i>Pdcl2</i>	<i>RGD1559712</i>	2.57	Phosducin-like 2
<i>Tcp10b</i>	—	2.46	t-complex protein 10b
Downregulated genes			
<i>Krtap14l</i>	<i>Krtap14</i>	0.06	Keratin-associated protein 14-like
<i>Olr88</i>	—	0.12	Olfactory receptor 88
<i>Skint4</i>	<i>RGD1566327</i>	0.17	Selection and upkeep of intraepithelial T cells 4
<i>Cdk14</i>	—	0.19	Cyclin-dependent kinase-like 4
<i>Pfkfb1</i>	<i>PFRX#Pfkfb01</i>	0.19	6-Phosphofructo-2-kinase/fructose-2,6-biphosphatase 1
<i>Satl1</i>	<i>RGD1565932</i>	0.19	Spermidine/spermine N1-acetyl transferase-like 1
<i>Skap1</i>	<i>Scap1#Skap55</i>	0.2	src kinase-associated phosphoprotein 1
<i>Rarb</i>	—	0.21	Retinoic acid receptor, beta
<i>Olr1260</i>	—	0.23	Olfactory receptor 1260
<i>Olr584</i>	—	0.23	Olfactory receptor 584
<i>Crb2</i>	<i>RGD1309368</i>	0.23	Crumbs homolog 2 ( <i>Drosophila</i> )
<i>Sorcs1</i>	—	0.24	Sortilin-related VPS10 domain-containing receptor 1

SUPPLEMENTARY TABLE S4. GENES REGULATED UNDER BOTH PROPYLTHIOURACIL AND METHIMAZOLE TREATMENT

Gene name	Synonym	Fold change		Description
		PTU	MMI	
Upregulated genes				
<i>Nqo1</i>	<i>Dia4#MGC93075</i>	2.03	4.12	NAD(P)H dehydrogenase, quinone 1
<i>Gsta3</i>	<i>Gsta1#Gsta5#MGC112704#Yc1</i>	2.79	3.47	Glutathione S-transferase A3
<i>Pir</i>	<i>MGC109484</i>	2.27	3.03	Pirin (iron-binding nuclear protein)
<i>Slc11a1</i>	<i>Bcg#Itg#Lsh#MGC124692#Nramp1</i>	2.06	2.92	Solute carrier family 11 (proton-coupled divalent metal ion transporters), member 1
<i>Me1</i>	<i>MOD1</i>	3.75	2.66	Malic enzyme 1, NADP(+)-dependent, cytosolic
<i>Pbld</i>	<i>MGC93185#Mawbp</i>	2.65	2.42	Phenazine biosynthesis-like protein domain-containing
<i>Gabrr2</i>	—	2.32	2.16	Gamma-aminobutyric acid (GABA) receptor, rho 2
<i>Aldh1a1</i>	<i>Ahd2#Aldh1#Aldh2</i>	3.29	2.15	Aldehyde dehydrogenase 1 family, member A1
<i>Mthfd2</i>	—	3.19	2.08	Methylenetetrahydrofolate dehydrogenase (NADP+-dependent) 2, Methenyltetrahydrofolate cyclohydrolase

PTU, propylthiouracil; MMI, methimazole.