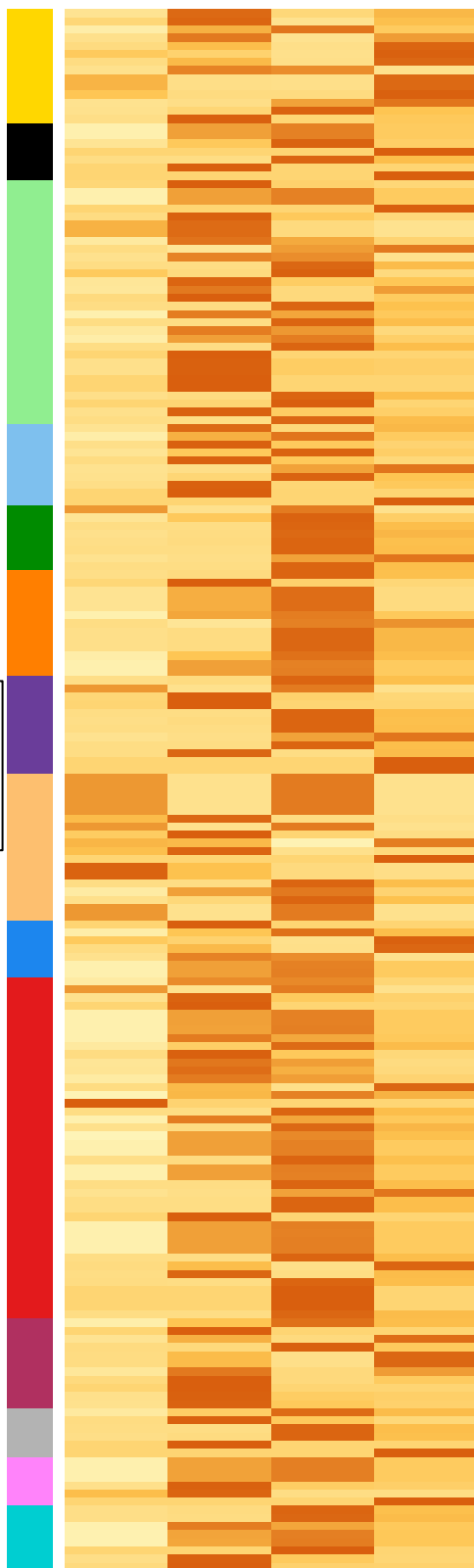
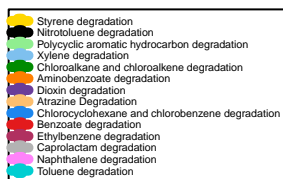
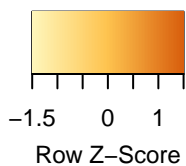


## Color Key



Diesel

Xylene

Hexane

Hexadecane

bdhAB; butanol dehydrogenase [EC:1.1.1.-]  
ALDH; aldehyde dehydrogenase (NAD+) [EC:1.2.1.3]  
E3.8.1.2; 2-haloacid dehalogenase [EC:3.8.1.2]  
dhaA; haloalkane dehalogenase [EC:3.8.1.5]  
nifH; nitrogenase iron protein NifH [EC:1.18.6.1]  
adhE; acetaldehyde dehydrogenase / alcohol dehydrogenase [EC:1.2.1.10 1.1.1.1]  
yiaY; alcohol dehydrogenase [EC:1.1.1.1]  
pcaH; protocatechuate 3,4-dioxygenase, beta subunit [EC:1.13.11.3]  
CYP81F; indol-3-yl-methylglucosinolate hydroxylase [EC:1.14.-.-]  
nahAb, nagAb, ndoA, nbzAb, dntAb; naphthalene 1,2-dioxygenase ferredoxin component  
xylC; benzaldehyde dehydrogenase (NAD) [EC:1.2.1.28]  
pcaH; protocatechuate 3,4-dioxygenase, beta subunit [EC:1.13.11.3]  
ytmI; uncharacterized N-acetyltransferase [EC:2.3.1.-]  
atoA; acetate CoA/acetate CoA-transferase beta subunit [EC:2.8.3.8 2.8.3.9]  
E3.1.3.1, phoA, phoB; alkaline phosphatase [EC:3.1.3.1]  
appA; 4-phytase / acid phosphatase [EC:3.1.3.26 3.1.3.2]  
phoD; alkaline phosphatase D [EC:3.1.3.1]  
E3.5.5.1; nitrilase [EC:3.5.5.1]  
paaF; echA; enoyl-CoA hydratase [EC:4.2.1.17]  
vanA; vanillate monooxygenase [EC:1.14.13.82]  
desB, galA; gallate dioxygenase [EC:1.13.11.57]  
antA; anthranilate 1,2-dioxygenase (deaminating, decarboxylating) large subunit [EC:1.14.12.1]  
abmG; 2-aminobenzoate-CoA ligase [EC:6.2.1.32]  
phoN; acid phosphatase (class A) [EC:3.1.3.2]  
antC; anthranilate 1,2-dioxygenase reductase component [EC:1.18.1.-]  
E1.1.1.1, adh; alcohol dehydrogenase [EC:1.1.1.1]  
mbtN, fadE14; acyl-ACP dehydrogenase [EC:1.3.99.-]  
ytmI; uncharacterized N-acetyltransferase [EC:2.3.1.-]  
adhP; alcohol dehydrogenase, propanol-prefering [EC:1.1.1.1]  
nahAb, nagAb, ndoA, nbzAb, dntAb; naphthalene 1,2-dioxygenase ferredoxin component  
E1.2.1.10; acetaldehyde dehydrogenase (acetylating) [EC:1.2.1.10]  
mhpE; 4-hydroxy 2-oxovalerate aldolase [EC:4.1.3.39]  
mhpD; 2-keto-4-pentenoate hydratase [EC:4.2.1.80]  
adhE; acetaldehyde dehydrogenase / alcohol dehydrogenase [EC:1.2.1.10 1.1.1.1]  
E1.1.1.90; aryl-alcohol dehydrogenase [EC:1.1.1.90]  
sdhA, frdA; succinate dehydrogenase / fumarate reductase, flavoprotein subunit [EC:1.3.5.1 1.3.5.4]  
sdhC, frdC; succinate dehydrogenase / fumarate reductase, cytochrome b subunit  
frdA; fumarate reductase flavoprotein subunit [EC:1.3.5.4]  
frdC; fumarate reductase subunit C  
E3.1.1.45; carboxymethylenebutenolidase [EC:3.1.1.45]  
catA; catechol 1,2-dioxygenase [EC:1.13.11.1]  
E1.2.1.10; acetaldehyde dehydrogenase (acetylating) [EC:1.2.1.10]  
dmpB, xylE; catechol 2,3-dioxygenase [EC:1.13.11.2]  
mhpD; 2-keto-4-pentenoate hydratase [EC:4.2.1.80]  
adhE; acetaldehyde dehydrogenase / alcohol dehydrogenase [EC:1.2.1.10 1.1.1.1]  
dmpC, xylG, praB; aminomuconate-semialdehyde/2-hydroxymuconate-6-semialdehyde dehydrogenase [EC:1.2.1.32 1.2.1.33]  
cmtD, dhbB; HCOMODA2-hydroxy-3-carboxy-muconic semialdehyde decarboxylase [EC:4.1.1.-]  
porB; pyruvate ferredoxin oxidoreductase beta subunit [EC:1.2.7.1]  
porG; pyruvate ferredoxin oxidoreductase gamma subunit [EC:1.2.7.1]  
cooF; anaerobic carbon-monoxide dehydrogenase iron sulfur subunit  
cooS, acsA; anaerobic carbon-monoxide dehydrogenase catalytic subunit [EC:1.2.7.4]  
coxM, cutM; aerobic carbon-monoxide dehydrogenase medium subunit [EC:1.2.5.3]  
hyaB, hybC; hydrogenase large subunit [EC:1.12.99.6]  
nfsA; nitroreductase [EC:1.-.-.-]  
nemA; N-ethylmaleimide reductase [EC:1.-.-.-]  
dsrB; dissimilatory sulfite reductase beta subunit [EC:1.8.99.5]  
E3.1.1.45; carboxymethylenebutenolidase [EC:3.1.1.45]  
dehH; haloacetate dehalogenase [EC:3.8.1.3]  
catB; muconate cycloisomerase [EC:5.5.1.1]  
paaH, hbd, fadB, mmgB; 3-hydroxybutyryl-CoA dehydrogenase [EC:1.1.1.157]  
GCDH, gcdH; glutaryl-CoA dehydrogenase [EC:1.3.8.6]  
pcaG; protocatechuate 3,4-dioxygenase, alpha subunit [EC:1.13.11.3]  
pobA; p-hydroxybenzoate 3-monooxygenase [EC:1.14.13.2]  
fadA, fadI; acetyl-CoA acyltransferase [EC:2.3.1.16]  
pcaI; 3-oxoadipate CoA-transferase, alpha subunit [EC:2.8.3.6]  
pcaD; 3-oxoadipate enol-lactonase [EC:3.1.1.24]  
pcaC; 4-carboxymuconolactone decarboxylase [EC:4.1.1.44]  
mhpE; 4-hydroxy 2-oxovalerate aldolase [EC:4.1.3.39]  
praC, xylH; 4-oxalocrotonate tautomerase [EC:5.3.2.6]  
catB; muconate cycloisomerase [EC:5.5.1.1]  
mhpD; 2-keto-4-pentenoate hydratase [EC:4.2.1.80]  
catC; muconolactone D-isomerase [EC:5.3.3.4]  
adhE; acetaldehyde dehydrogenase / alcohol dehydrogenase [EC:1.2.1.10 1.1.1.1]  
desB, galA; gallate dioxygenase [EC:1.13.11.57]  
benA-xylX; benzoate/toluene 1,2-dioxygenase subunit alpha [EC:1.14.12.10 1.14.12.-]  
benD-xylL; dihydroxycyclohexadiene carboxylate dehydrogenase [EC:1.3.1.25 1.3.1.-]  
badH; 2-hydroxycyclohexanecarboxyl-CoA dehydrogenase [EC:1.1.1.-]  
dmpC, xylG, praB; aminomuconate-semialdehyde/2-hydroxymuconate-6-semialdehyde dehydrogenase [EC:1.2.1.32 1.2.1.33]  
ligC; 2-hydroxy-4-carboxymuconate semialdehyde hemiacetal dehydrogenase [EC:1.1.1.312]  
ligI; 2-pyrone-4,6-dicarboxylate lactonase [EC:3.1.1.57]  
feaB; phenylacetaldehyde dehydrogenase [EC:1.2.1.39]  
HGD, hmgA; homogentisate 1,2-dioxygenase [EC:1.13.11.5]  
gctA; glutaconate CoA-transferase, subunit A [EC:2.8.3.12]  
E3.5.1.4, amiE; amidase [EC:3.5.1.4]  
E3.5.5.7; aliphatic nitrilase [EC:3.5.5.7]  
maiA, GSTZ1; maleylacetoacetate isomerase [EC:5.2.1.2]  
ytmI; uncharacterized N-acetyltransferase [EC:2.3.1.-]  
mhpD; 2-keto-4-pentenoate hydratase [EC:4.2.1.80]  
nahAa, nagAa, ndoR, nbzAa, dntAa; naphthalene 1,2-dioxygenase ferredoxin reductase component [EC:1.18.1.7]  
ureB; urease subunit beta [EC:3.5.1.5]  
atzF; allophanate hydrolase [EC:3.5.1.54]  
ureAB; urease subunit gamma/beta [EC:3.5.1.5]  
E3.1.1.17, gnl, RGN; gluconolactonase [EC:3.1.1.17]  
fadJ; 3-hydroxyacyl-CoA dehydrogenase / enoyl-CoA hydratase / 3-hydroxybutyryl-CoA epimerase [EC:1.1.1.35 4.2.1.17 5.4.2.1.17]  
chnB; cyclohexanone monooxygenase [EC:1.14.13.22]  
aldH; NADP-dependent aldehyde dehydrogenase [EC:1.2.1.4]