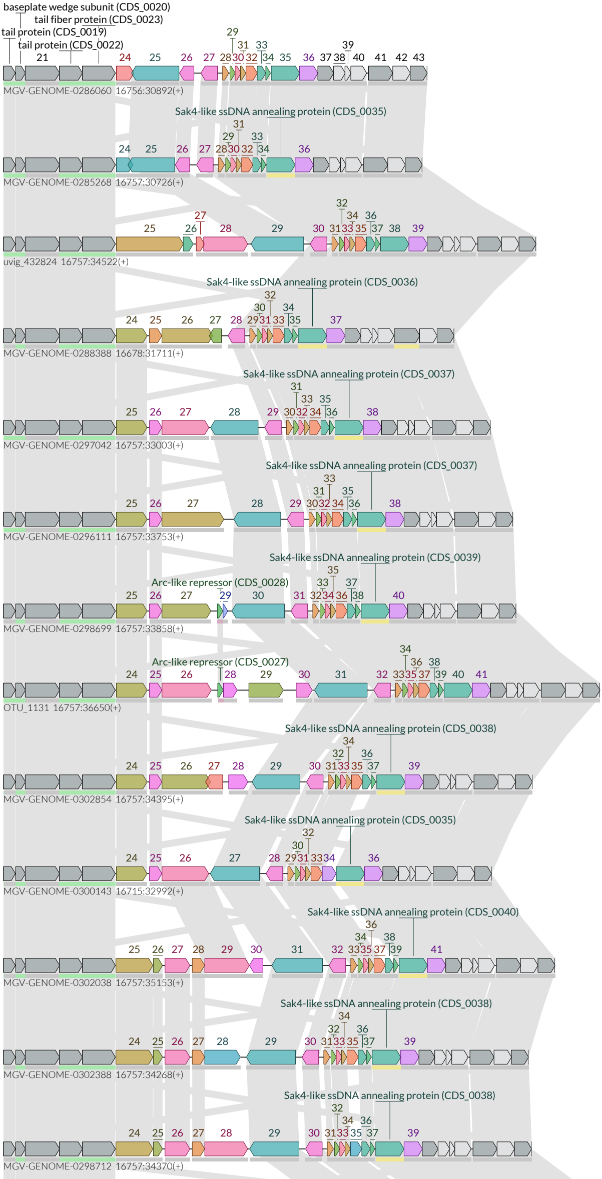
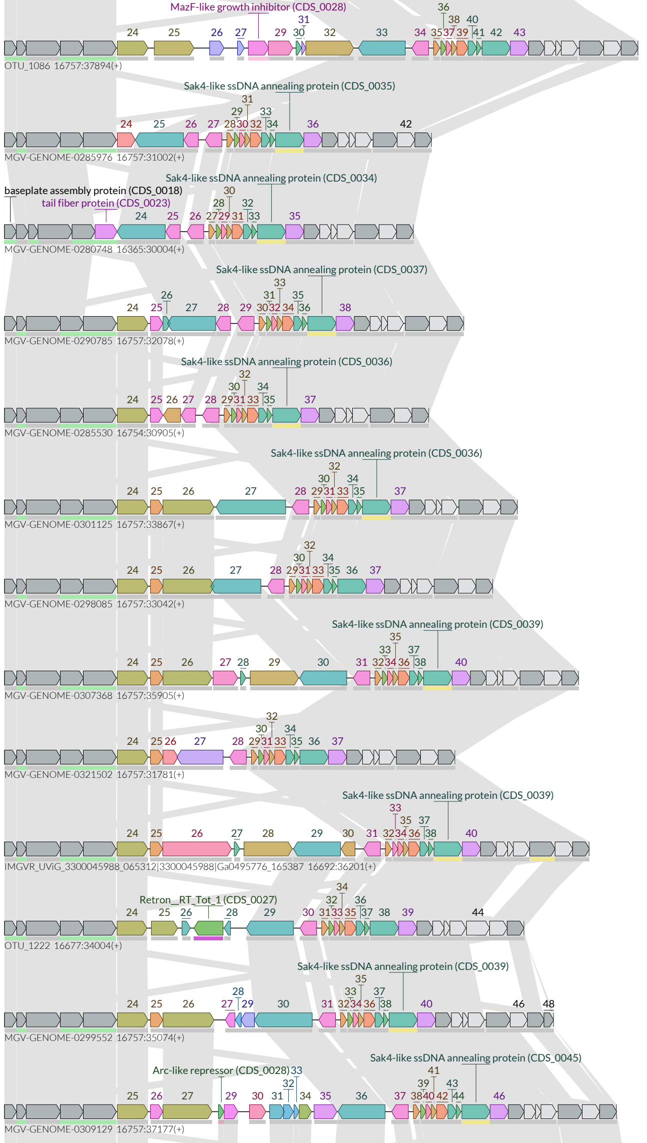
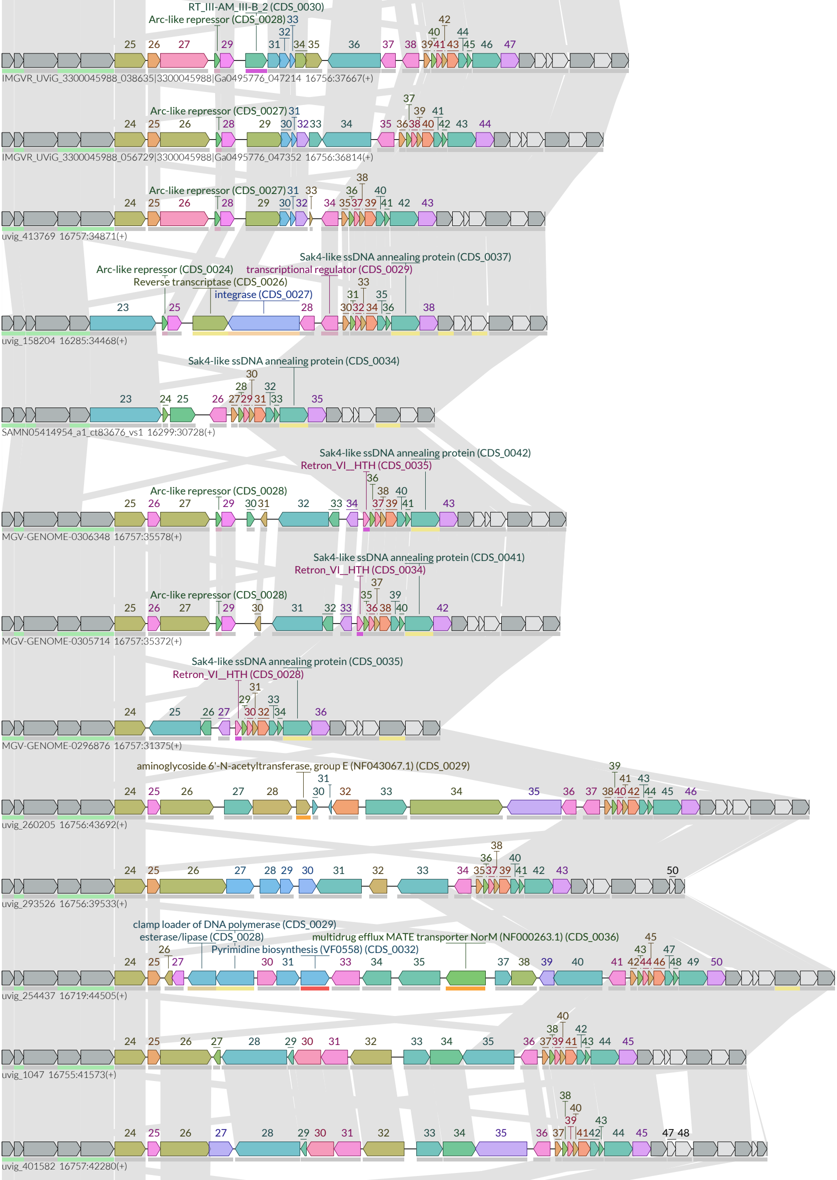

baseplate wedge subunit (CDS_0020)
tail fiber protein (CDS_0023)
tail protein (CDS_0019)
tail protein (CDS_0022)
21 24 25 26 27 28 29 30 31 32 33 34 35 36 37 38 39 40 41 42 43
MGV-GENOME-0286060 16756:30892(+)
Sak4-like ssDNA annealing protein (CDS_0035)
24 25 26 27 28 29 30 31 32 33 34 36
MGV-GENOME-0285268 16757:30726(+)
25 26 27 28 29 30 31 32 33 34 35 36 37 38 39
uvig_432824 16757:34522(+)
Sak4-like ssDNA annealing protein (CDS_0036)
24 25 26 27 28 29 30 31 32 33 34 35 37
MGV-GENOME-0288388 16678:31711(+)
Sak4-like ssDNA annealing protein (CDS_0037)
25 26 27 28 29 30 31 32 33 34 35 36 38
MGV-GENOME-0297042 16757:33003(+)
Sak4-like ssDNA annealing protein (CDS_0037)
25 26 27 28 29 30 31 32 33 34 35 36 38
MGV-GENOME-0296111 16757:33753(+)
Sak4-like ssDNA annealing protein (CDS_0039)
Arc-like repressor (CDS_0028)
25 26 27 29 30 31 32 33 34 35 36 37 38 40
MGV-GENOME-0298699 16757:33858(+)
Arc-like repressor (CDS_0027)
24 25 26 28 29 30 31 32 33 34 35 36 37 38 39 40 41
OTU_1131 16757:36650(+)
Sak4-like ssDNA annealing protein (CDS_0038)
24 25 26 27 28 29 30 31 32 33 34 35 36 37 39
MGV-GENOME-0302854 16757:34395(+)
Sak4-like ssDNA annealing protein (CDS_0035)
24 25 26 27 28 29 30 31 32 33 34 36
MGV-GENOME-0300143 16715:32992(+)
Sak4-like ssDNA annealing protein (CDS_0040)
25 26 27 28 29 30 31 32 33 34 35 36 37 38 39 41
MGV-GENOME-0302038 16757:35153(+)
Sak4-like ssDNA annealing protein (CDS_0038)
24 25 26 27 28 29 30 31 32 33 34 35 36 37 39
MGV-GENOME-0302388 16757:34268(+)
Sak4-like ssDNA annealing protein (CDS_0038)
24 25 26 27 28 29 30 31 32 33 34 35 36 37 39
MGV-GENOME-0298712 16757:34370(+)


MazF-like growth inhibitor (CDS_0028)
24 25 26 27 29 30 31 32 33 34 35 36 37 38 39 40 41 42 43
OTU_1086 16757:37894(+)
Sak4-like ssDNA annealing protein (CDS_0035)
24 25 26 27 28 29 30 31 32 33 34 36 42
MGV-GENOME-0285976 16757:31002(+)
baseplate assembly protein (CDS_0018)
tail fiber protein (CDS_0023)
Sak4-like ssDNA annealing protein (CDS_0034)
24 25 26 27 28 29 30 31 32 33 35
MGV-GENOME-0280748 16365:30004(+)
Sak4-like ssDNA annealing protein (CDS_0037)
24 25 26 27 28 29 30 31 32 33 34 35 36 38
MGV-GENOME-0290785 16757:32078(+)
Sak4-like ssDNA annealing protein (CDS_0036)
24 25 26 27 28 29 30 31 32 33 34 35 37
MGV-GENOME-0285530 16754:30905(+)
Sak4-like ssDNA annealing protein (CDS_0036)
24 25 26 27 28 29 30 31 32 33 34 35 37
MGV-GENOME-0301125 16757:33867(+)
24 25 26 27 28 29 30 31 32 33 34 35 36 37
MGV-GENOME-0298085 16757:33042(+)
Sak4-like ssDNA annealing protein (CDS_0039)
24 25 26 27 28 29 30 31 32 33 34 35 36 37 38 40
MGV-GENOME-0307368 16757:35905(+)
24 25 26 27 28 29 30 31 32 33 34 35 36 37
MGV-GENOME-0321502 16757:31781(+)
Sak4-like ssDNA annealing protein (CDS_0039)
24 25 26 27 28 29 30 31 32 33 34 35 36 37 38 40
IMGVR_UViG_3300045988_065312|3300045988|Ga0495776_165387 16692:36201(+)
Retron__RT_Tot_1 (CDS_0027)
24 25 26 28 29 30 31 32 33 34 35 36 37 38 39 44
OTU_1222 16677:34004(+)
Sak4-like ssDNA annealing protein (CDS_0039)
24 25 26 27 28 29 30 31 32 33 34 35 36 37 38 40 46 48
MGV-GENOME-0299552 16757:35074(+)
Sak4-like ssDNA annealing protein (CDS_0045)
Arc-like repressor (CDS_0028)
25 26 27 29 30 31 32 33 34 35 36 37 38 39 40 41 42 43 44 46
MGV-GENOME-0309129 16757:37177(+)


RT_III-AM_III-B_2 (CDS_0030)
Arc-like repressor (CDS_0028)
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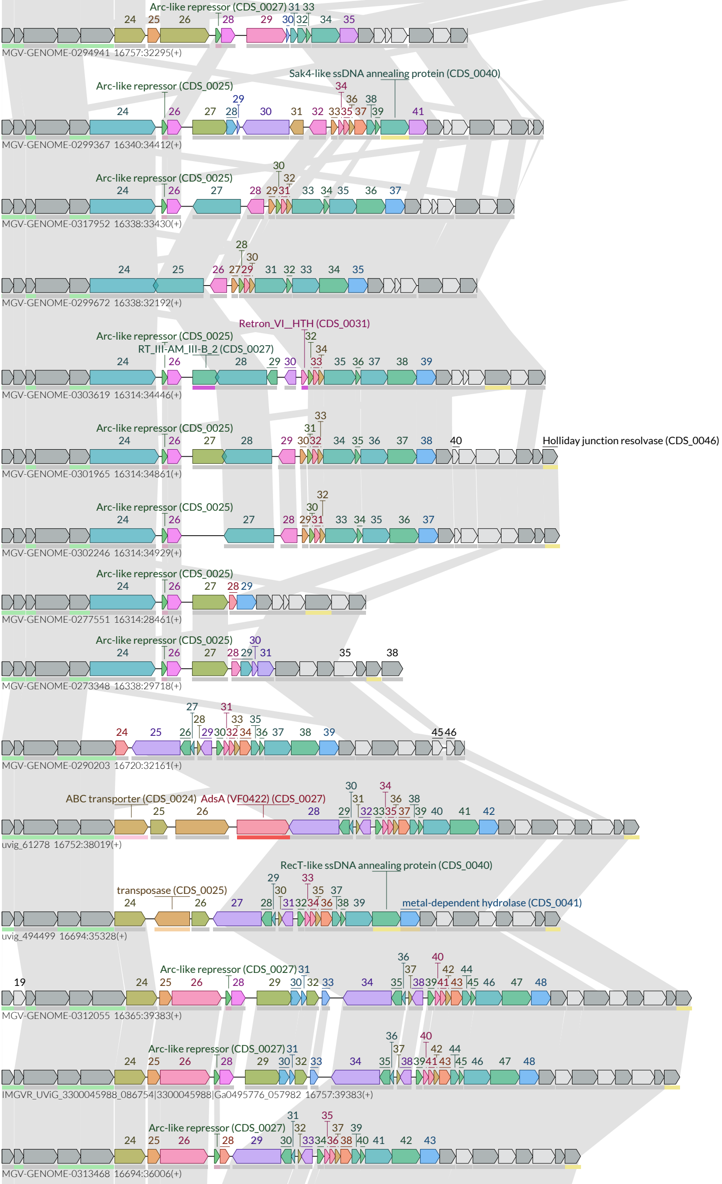
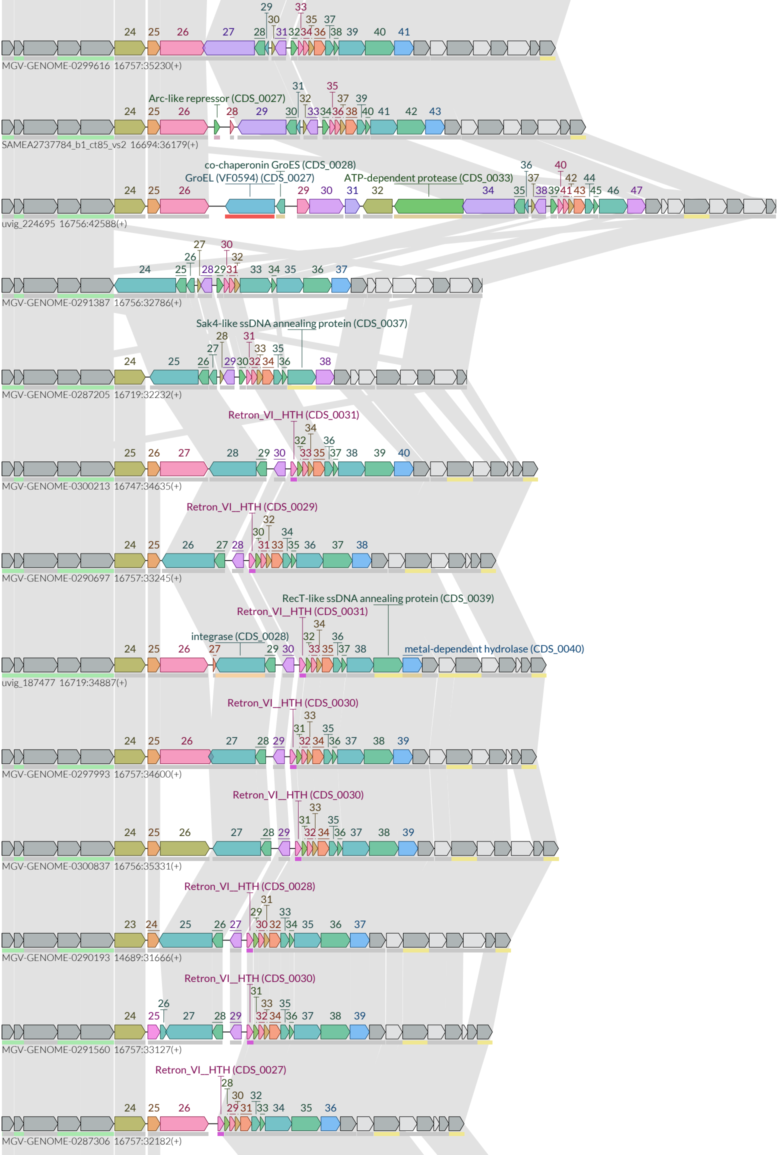
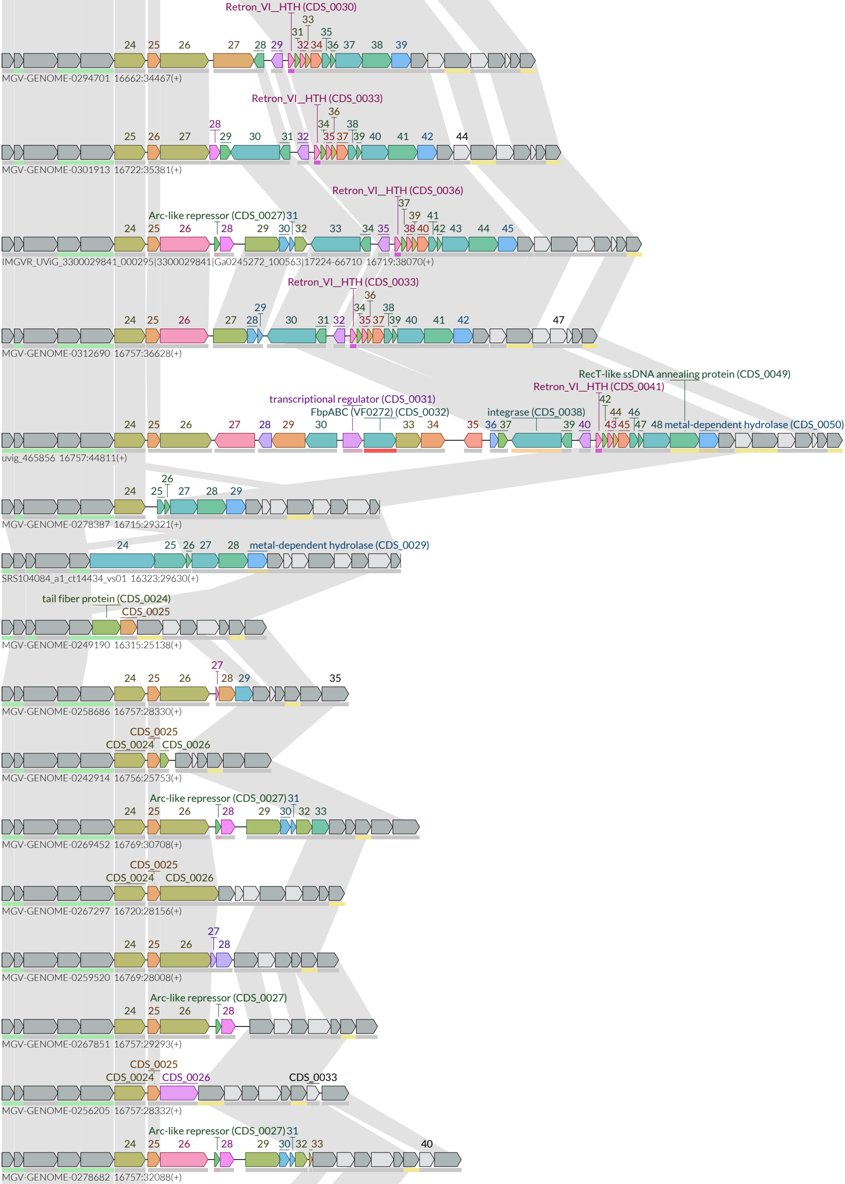
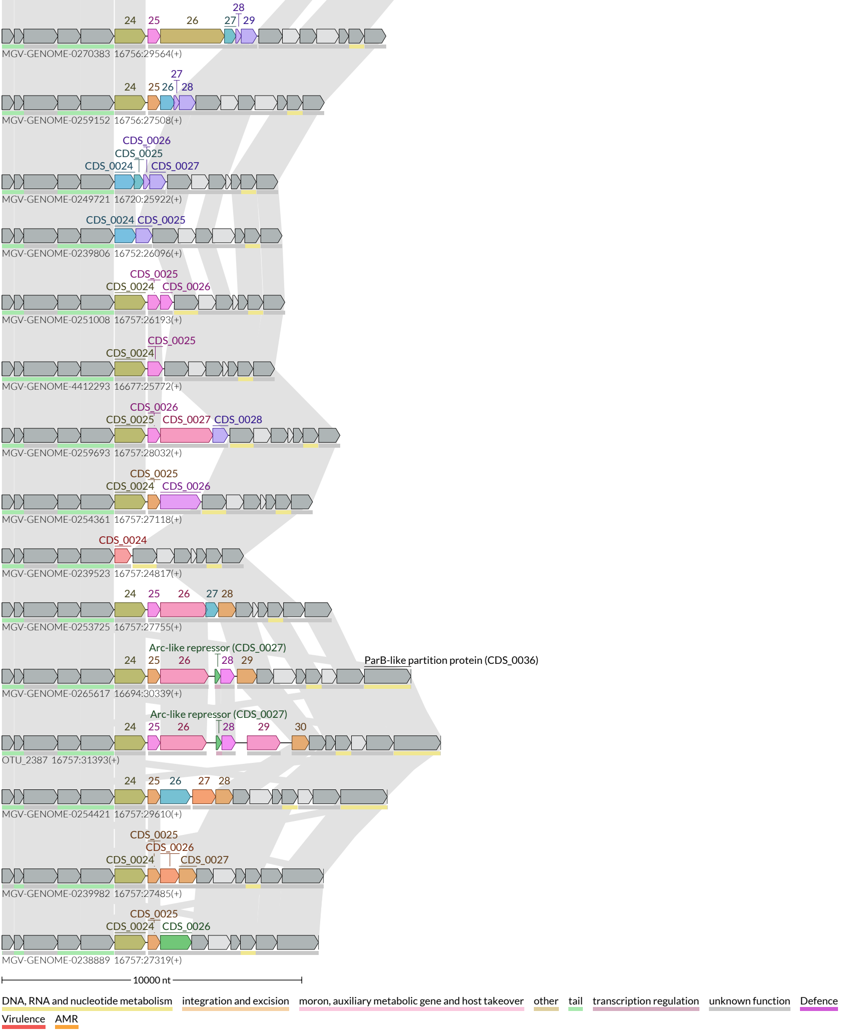
Arc-like repressor (CDS_0027)
IMGVR_UViG_3300045988_056729|3300045988|Ga0495776_047352 16756:36814(+)
Arc-like repressor (CDS_0027)
uvig_413769 16757:34871(+)
Sak4-like ssDNA annealing protein (CDS_0037)
Arc-like repressor (CDS_0024)
transcriptional regulator (CDS_0029)
Reverse transcriptase (CDS_0026)
integrase (CDS_0027)
uvig_158204 16285:34468(+)
Sak4-like ssDNA annealing protein (CDS_0034)
SAMN05414954_a1_ct83676_vs1 16299:30728(+)
Sak4-like ssDNA annealing protein (CDS_0042)
Retron_VI__HTH (CDS_0035)
Arc-like repressor (CDS_0028)
MGV-GENOME-0306348 16757:35578(+)
Sak4-like ssDNA annealing protein (CDS_0041)
Retron_VI__HTH (CDS_0034)
Arc-like repressor (CDS_0028)
MGV-GENOME-0305714 16757:35372(+)
Sak4-like ssDNA annealing protein (CDS_0035)
Retron_VI__HTH (CDS_0028)
MGV-GENOME-0296876 16757:31375(+)
aminoglycoside 6'-N-acetyltransferase, group E (NF043067.1) (CDS_0029)
uvig_260205 16756:43692(+)
uvig_293526 16756:39533(+)
clamp loader of DNA polymerase (CDS_0029)
esterase/lipase (CDS_0028)
multidrug efflux MATE transporter NorM (NF000263.1) (CDS_0036)
Pyrimidine biosynthesis (VF0558) (CDS_0032)
uvig_254437 16719:44505(+)
uvig_1047 16755:41573(+)
uvig_401582 16757:42280(+)


Arc-like repressor (CDS_0027) 31 33
24 25 26 28 29 30 32 34 35
MGV-GENOME-0294941 16757:32295(+)
Sak4-like ssDNA annealing protein (CDS_0040)
Arc-like repressor (CDS_0025)
34
29 36 38
24 26 27 28 30 31 32 33 35 37 39 41
MGV-GENOME-0299367 16340:34412(+)
30
Arc-like repressor (CDS_0025) 32
24 26 27 28 29 31 33 34 35 36 37
MGV-GENOME-0317952 16338:33430(+)
28
30
24 25 26 27 29 31 32 33 34 35
MGV-GENOME-0299672 16338:32192(+)
Retron_VI_HTH (CDS_0031)
Arc-like repressor (CDS_0025) 32
RT_III-AM_III-B_2 (CDS_0027) 34
24 26 28 29 30 33 35 36 37 38 39
MGV-GENOME-0303619 16314:34446(+)
33
Arc-like repressor (CDS_0025) 31
24 26 27 28 29 30 32 34 35 36 37 38 40
Holliday junction resolvase (CDS_0046)
MGV-GENOME-0301965 16314:34861(+)
32
Arc-like repressor (CDS_0025) 30
24 26 27 28 29 31 33 34 35 36 37
MGV-GENOME-0302246 16314:34929(+)
Arc-like repressor (CDS_0025)
24 26 27 28 29
MGV-GENOME-0277551 16314:28461(+)
Arc-like repressor (CDS_0025) 30
24 26 27 28 29 31 35 38
MGV-GENOME-0273348 16338:29718(+)
27 31
28 33 35
24 25 26 29 30 32 34 36 37 38 39 45 46
MGV-GENOME-0290203 16720:32161(+)
30 34
ABC transporter (CDS_0024) AdsA (VF0422) (CDS_0027) 31 36 38
25 26 28 29 32 33 35 37 39 40 41 42
uvig_61278 16752:38019(+)
RecT-like ssDNA annealing protein (CDS_0040)
29 33
transposase (CDS_0025) 30 35 37
24 26 27 28 31 32 34 36 38 39
metal-dependent hydrolase (CDS_0041)
uvig_494499 16694:35328(+)
36 40
Arc-like repressor (CDS_0027) 31 37 42 44
19 24 25 26 28 29 30 32 33 34 35 38 39 41 43 45 46 47 48
MGV-GENOME-0312055 16365:39383(+)
36 40
Arc-like repressor (CDS_0027) 31 37 42 44
24 25 26 28 29 30 32 33 34 35 38 39 41 43 45 46 47 48
IMGVR_UViG_3300045988_086754|3300045988|Ga0495776_057982 16757:39383(+)
31 35
Arc-like repressor (CDS_0027) 32 37 39
24 25 26 28 29 30 33 34 36 38 40 41 42 43
MGV-GENOME-0313468 16694:36006(+)


MGV-GENOME-0299616 16757:35230(+)
Arc-like repressor (CDS_0027)
SAMEA2737784_b1_ct85_vs2 16694:36179(+)
co-chaperonin GroES (CDS_0028)
GroEL (VF0594) (CDS_0027)
ATP-dependent protease (CDS_0033)
uvig_224695 16756:42588(+)
MGV-GENOME-0291387 16756:32786(+)
Sak4-like ssDNA annealing protein (CDS_0037)
MGV-GENOME-0287205 16719:32232(+)
Retron_VI__HTH (CDS_0031)
MGV-GENOME-0300213 16747:34635(+)
Retron_VI__HTH (CDS_0029)
MGV-GENOME-0290697 16757:33245(+)
RecT-like ssDNA annealing protein (CDS_0039)
Retron_VI__HTH (CDS_0031)
integrase (CDS_0028)
metal-dependent hydrolase (CDS_0040)
uvig_187477 16719:34887(+)
Retron_VI__HTH (CDS_0030)
MGV-GENOME-0297993 16757:34600(+)
Retron_VI__HTH (CDS_0030)
MGV-GENOME-0300837 16756:35331(+)
Retron_VI__HTH (CDS_0028)
MGV-GENOME-0290193 14689:31666(+)
Retron_VI__HTH (CDS_0030)
MGV-GENOME-0291560 16757:33127(+)
Retron_VI__HTH (CDS_0027)
MGV-GENOME-0287306 16757:32182(+)


Retron_VI__HTH (CDS_0030)
24 25 26 27 28 29 31 32 33 34 35 36 37 38 39
MGV-GENOME-0294701 16662:34467(+)
Retron_VI__HTH (CDS_0033)
25 26 27 28 29 30 31 32 34 35 36 37 38 39 40 41 42 44
MGV-GENOME-0301913 16722:35381(+)
Retron_VI__HTH (CDS_0036)
Arc-like repressor (CDS_0027)
24 25 26 28 29 30 31 32 33 34 35 37 38 39 40 41 42 43 44 45
IMGVR_UViG_3300029841_000295|3300029841|Ga0245272_100563|17224-66710 16719:38070(+)
Retron_VI__HTH (CDS_0033)
24 25 26 27 28 29 30 31 32 34 35 36 37 38 39 40 41 42 47
MGV-GENOME-0312690 16757:36628(+)
RecT-like ssDNA annealing protein (CDS_0049)
Retron_VI__HTH (CDS_0041)
transcriptional regulator (CDS_0031)
FbpABC (VF0272) (CDS_0032)
integrase (CDS_0038)
metal-dependent hydrolase (CDS_0050)
24 25 26 27 28 29 30 33 34 35 36 37 39 40 42 43 44 45 46 47 48
uvig_465856 16757:44811(+)
24 25 26 27 28 29
MGV-GENOME-0278387 16715:29321(+)
metal-dependent hydrolase (CDS_0029)
24 25 26 27 28
SRS104084_a1_ct14434_vs01 16323:29630(+)
tail fiber protein (CDS_0024)
CDS_0025
MGV-GENOME-0249190 16315:25138(+)
24 25 26 27 28 29 35
MGV-GENOME-0258686 16757:28330(+)
CDS_0025
CDS_0024 CDS_0026
MGV-GENOME-0242914 16756:25753(+)
Arc-like repressor (CDS_0027)
24 25 26 28 29 30 31 32 33
MGV-GENOME-0269452 16769:30708(+)
CDS_0025
CDS_0024 CDS_0026
MGV-GENOME-0267297 16720:28156(+)
24 25 26 27 28
MGV-GENOME-0259520 16769:28008(+)
Arc-like repressor (CDS_0027)
24 25 26 28
MGV-GENOME-0267851 16757:29293(+)
CDS_0025
CDS_0024 CDS_0026 CDS_0033
MGV-GENOME-0256205 16757:28332(+)
Arc-like repressor (CDS_0027)
24 25 26 28 29 30 31 32 33 40
MGV-GENOME-0278682 16757:32088(+)


28
24
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MGV-GENOME-0270383 16756:29564(+)
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25 26
28
MGV-GENOME-0259152 16756:27508(+)
CDS_0026
CDS_0025
CDS_0024
CDS_0027
MGV-GENOME-0249721 16720:25922(+)
CDS_0024 CDS_0025
MGV-GENOME-0239806 16752:26096(+)
CDS_0025
CDS_0024
CDS_0026
MGV-GENOME-0251008 16757:26193(+)
CDS_0025
CDS_0024
MGV-GENOME-4412293 16677:25772(+)
CDS_0026
CDS_0025
CDS_0027
CDS_0028
MGV-GENOME-0259693 16757:28032(+)
CDS_0025
CDS_0024
CDS_0026
MGV-GENOME-0254361 16757:27118(+)
CDS_0024
MGV-GENOME-0239523 16757:24817(+)
24
25
26
27 28
MGV-GENOME-0253725 16757:27755(+)
Arc-like repressor (CDS_0027)
24
25
26
28
29
ParB-like partition protein (CDS_0036)
MGV-GENOME-0265617 16694:30339(+)
Arc-like repressor (CDS_0027)
24
25
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28
29
30
OTU_2387 16757:31393(+)
24
25
26
27
28
MGV-GENOME-0254421 16757:29610(+)
CDS_0025
CDS_0026
CDS_0024
CDS_0027
MGV-GENOME-0239982 16757:27485(+)
CDS_0025
CDS_0024
CDS_0026
MGV-GENOME-0238889 16757:27319(+)
10000 nt
DNA, RNA and nucleotide metabolism
integration and excision
moron, auxiliary metabolic gene and host takeover
other
tail
transcription regulation
unknown function
Defence
Virulence
AMR