

Note: Tracks are now grouped by subcluster and scaled. Switching in subcluster is indicated by changes in track color. Track scale is now set by default to display the region 30 bp upstream of start 1 to 30 bp downstream of the last possible start. If this default region is judged to be packed too tightly with annotated starts, the track will be further scaled to only show that region of the ORF with annotated starts. This action will be indicated by adding "Zoomed" to the title. For starts, yellow indicates the location of called starts comprised solely of Glimmer/GeneMark auto-annotations, green indicates the location of called starts with at least 1 manual gene annotation.

Pham 86956 Report

This analysis was run 04/28/24 on database version 559.

Pham number 86956 has 16 members, 2 are drafts.

Phages represented in each track:

Track 1 : Rizwana_47Track 2 : BeeGee_53

• Track 3: Budski_64, Birdsong_57, Kenna_57, Asapag_57, Lutum_62, Getalong_60

Track 4 : Whitney_57

• Track 5 : BlueNGold_35, Mareelih_35, Forza_36, Boopy_37

Track 6 : GMA2_88Track 7 : Frankie_70Track 8 : pZL12_96

Summary of Final Annotations (See graph section above for start numbers):

The start number called the most often in the published annotations is 12, it was called in 12 of the 14 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

• Asapag_57, BeeGee_53, Birdsong_57, BlueNGold_35, Boopy_37, Budski_64, Forza_36, GMA2_88, Getalong_60, Kenna_57, Lutum_62, Mareelih_35, Whitney_57,

Genes that have the "Most Annotated" start but do not call it:

Genes that do not have the "Most Annotated" start:

Frankie_70, Rizwana_47, pZL12_96,

Summary by start number:

Start 11:

- Found in 1 of 16 (6.2%) of genes in pham
- Manual Annotations of this start: 1 of 14
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Frankie_70 (F1),

Start 12:

• Found in 13 of 16 (81.2%) of genes in pham

- Manual Annotations of this start: 12 of 14
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Asapag_57 (DN1), BeeGee_53 (CY), Birdsong_57 (DN), BlueNGold_35 (DS), Boopy_37 (DS), Budski_64 (DN), Forza_36 (DS), GMA2_88 (DS), Getalong_60 (DN1), Kenna_57 (DN1), Lutum_62 (DN1), Mareelih_35 (DS), Whitney_57 (DN1),

Start 13:

- Found in 1 of 16 (6.2%) of genes in pham
- Manual Annotations of this start: 1 of 14
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Rizwana_47 (AP1),

Start 14:

- Found in 1 of 16 (6.2%) of genes in pham
- No Manual Annotations of this start.
- Called 100.0% of time when present
- Phage (with cluster) where this start called: pZL12 96 (singleton),

Summary by clusters:

There are 7 clusters represented in this pham: DN, F1, singleton, AP1, CY, DN1, DS,

Info for manual annotations of cluster AP1:

•Start number 13 was manually annotated 1 time for cluster AP1.

Info for manual annotations of cluster CY:

•Start number 12 was manually annotated 1 time for cluster CY.

Info for manual annotations of cluster DN:

•Start number 12 was manually annotated 2 times for cluster DN.

Info for manual annotations of cluster DN1:

•Start number 12 was manually annotated 5 times for cluster DN1.

Info for manual annotations of cluster DS:

•Start number 12 was manually annotated 4 times for cluster DS.

Info for manual annotations of cluster F1:

•Start number 11 was manually annotated 1 time for cluster F1.

Gene Information:

Gene: Asapag_57 Start: 37450, Stop: 37845, Start Num: 12

Candidate Starts for Asapag_57:

(Start: 12 @37450 has 12 MA's), (16, 37543), (19, 37615), (23, 37705), (24, 37708), (26, 37735), (28, 37747), (29, 37771),

Gene: BeeGee_53 Start: 37245, Stop: 37640, Start Num: 12

Candidate Starts for BeeGee 53:

(10, 37218), (Start: 12 @37245 has 12 MA's), (16, 37338), (19, 37410), (23, 37500), (24, 37503), (26, 37530), (28, 37542), (29, 37566), (35, 37620),

Gene: Birdsong_57 Start: 37671, Stop: 38066, Start Num: 12

Candidate Starts for Birdsong_57:

(Start: 12 @37671 has 12 MA's), (16, 37764), (19, 37836), (23, 37926), (24, 37929), (26, 37956), (28, 37968), (29, 37992),

Gene: BlueNGold_35 Start: 12533, Stop: 12150, Start Num: 12

Candidate Starts for BlueNGold 35:

(Start: 12 @12533 has 12 MA's), (20, 12329), (23, 12284), (30, 12206), (31, 12185), (34, 12176),

Gene: Boopy_37 Start: 12545, Stop: 12162, Start Num: 12

Candidate Starts for Boopy 37:

(Start: 12 @12545 has 12 MA's), (20, 12341), (23, 12296), (30, 12218), (31, 12197), (34, 12188),

Gene: Budski 64 Start: 39858, Stop: 40253, Start Num: 12

Candidate Starts for Budski 64:

(Start: 12 @39858 has 12 MA's), (16, 39951), (19, 40023), (23, 40113), (24, 40116), (26, 40143), (28, 40155), (29, 40179),

Gene: Forza_36 Start: 12461, Stop: 12078, Start Num: 12

Candidate Starts for Forza 36:

(Start: 12 @12461 has 12 MA's), (20, 12257), (23, 12212), (30, 12134), (31, 12113), (34, 12104),

Gene: Frankie_70 Start: 43731, Stop: 44135, Start Num: 11

Candidate Starts for Frankie_70:

(1, 43365), (2, 43506), (3, 43533), (4, 43554), (6, 43602), (Start: 11 @43731 has 1 MA's), (23, 43989), (24, 43992), (27, 44025), (36, 44112),

Gene: GMA2_88 Start: 81784, Stop: 81347, Start Num: 12

Candidate Starts for GMA2 88:

(9, 81829), (Start: 12 @81784 has 12 MA's), (15, 81772), (21, 81556), (22, 81553), (23, 81523),

Gene: Getalong_60 Start: 39702, Stop: 40097, Start Num: 12

Candidate Starts for Getalong 60:

(Start: 12 @39702 has 12 MA's), (16, 39795), (19, 39867), (23, 39957), (24, 39960), (26, 39987), (28, 39999), (29, 40023),

Gene: Kenna_57 Start: 37903, Stop: 38298, Start Num: 12

Candidate Starts for Kenna_57:

(Start: 12 @37903 has 12 MA's), (16, 37996), (19, 38068), (23, 38158), (24, 38161), (26, 38188), (28, 38200), (29, 38224),

Gene: Lutum 62 Start: 39067, Stop: 39462, Start Num: 12

Candidate Starts for Lutum_62:

(Start: 12 @39067 has 12 MA's), (16, 39160), (19, 39232), (23, 39322), (24, 39325), (26, 39352), (28, 39364), (29, 39388),

Gene: Mareelih 35 Start: 11963, Stop: 11607, Start Num: 12

Candidate Starts for Mareelih 35:

(Start: 12 @11963 has 12 MA's), (20, 11759), (23, 11714), (30, 11663), (31, 11642), (34, 11633),

Gene: Rizwana_47 Start: 39152, Stop: 38748, Start Num: 13

Candidate Starts for Rizwana_47:

(3, 39368), (7, 39290), (Start: 13 @39152 has 1 MA's), (17, 39020), (18, 38999), (23, 38900), (24, 38897), (25, 38879), (28, 38858), (29, 38834), (31, 38801), (33, 38792), (37, 38759),

Gene: Whitney_57 Start: 39509, Stop: 39904, Start Num: 12

Candidate Starts for Whitney_57:

(Start: 12 @39509 has 12 MA's), (19, 39674), (23, 39764), (24, 39767), (26, 39794), (28, 39806), (32, 39866),

Gene: pZL12_96 Start: 77420, Stop: 77794, Start Num: 14

Candidate Starts for pZL12_96:

(5, 77258), (8, 77336), (14, 77420), (28, 77693), (31, 77750),