

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 168771 Report

This analysis was run 07/09/24 on database version 566.

Pham number 168771 has 9 members, 4 are drafts.

Phages represented in each track:

• Track 1: Anekin 45

• Track 2 : BrayBeast_49, Raqqa_60

Track 3 : Shoya_50

Track 4 : Elesar_48

Track 5 : Kukla_78

• Track 6 : Bauer_58

• Track 7 : Zucker_35

Track 8 : Khuang_35

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

The start number called the most often in the published annotations is 13, it was called in 3 of the 5 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

Bauer_58, BrayBeast_49, Khuang_35, Kukla_78, Raqqa_60, Shoya_50,

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

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

Anekin_45, Elesar_48, Zucker_35,

Summary by start number:

Start 5:

- Found in 2 of 9 (22.2%) of genes in pham
- Manual Annotations of this start: 1 of 5
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Anekin_45 (AY), Elesar_48 (FF),

Start 7:

- Found in 1 of 9 (11.1%) of genes in pham
- Manual Annotations of this start: 1 of 5

- Called 100.0% of time when present
- Phage (with cluster) where this start called: Zucker_35 (FN),

Start 13:

- Found in 6 of 9 (66.7%) of genes in pham
- Manual Annotations of this start: 3 of 5
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Bauer_58 (FN), BrayBeast_49 (FB), Khuang_35 (UNK), Kukla_78 (FJ), Raqqa_60 (AY), Shoya_50 (FB),

Summary by clusters:

There are 6 clusters represented in this pham: FB, FF, AY, FJ, UNK, FN,

Info for manual annotations of cluster FB:

•Start number 13 was manually annotated 2 times for cluster FB.

Info for manual annotations of cluster FF:

•Start number 5 was manually annotated 1 time for cluster FF.

Info for manual annotations of cluster FN:

- •Start number 7 was manually annotated 1 time for cluster FN.
- •Start number 13 was manually annotated 1 time for cluster FN.

Gene Information:

Gene: Anekin 45 Start: 29811, Stop: 30191, Start Num: 5

Candidate Starts for Anekin 45:

(Start: 5 @29811 has 1 MA's), (6, 29820), (16, 29958), (18, 29985), (21, 30072), (27, 30108), (30, 30147),

Gene: Bauer_58 Start: 32955, Stop: 33227, Start Num: 13

Candidate Starts for Bauer 58:

(Start: 13 @32955 has 3 MA's), (15, 32964), (17, 32997), (20, 33093), (24, 33135), (31, 33198), (32, 33207), (33, 33210),

Gene: BrayBeast_49 Start: 28984, Stop: 29268, Start Num: 13

Candidate Starts for BrayBeast 49:

(9, 28945), (Start: 13 @28984 has 3 MA's), (15, 28993), (20, 29122), (26, 29170), (28, 29191),

Gene: Elesar 48 Start: 36967, Stop: 37350, Start Num: 5

Candidate Starts for Elesar 48:

(1, 36751), (2, 36763), (Start: 5 @ 36967 has 1 MA's), (11, 37060), (12, 37066), (14, 37084), (19, 37177), (20, 37216),

Gene: Khuang 35 Start: 24689, Stop: 24417, Start Num: 13

Candidate Starts for Khuang 35:

(Start: 13 @24689 has 3 MA's), (15, 24680), (20, 24551), (24, 24509), (31, 24446), (32, 24437), (33, 24434),

Gene: Kukla_78 Start: 42658, Stop: 42945, Start Num: 13

Candidate Starts for Kukla_78:

(Start: 13 @42658 has 3 MA's), (15, 42667), (20, 42796), (21, 42805), (22, 42817), (23, 42829),

Gene: Ragga_60 Start: 33013, Stop: 33297, Start Num: 13

Candidate Starts for Raqqa_60:

(9, 32974), (Start: 13 @33013 has 3 MA's), (15, 33022), (20, 33151), (26, 33199), (28, 33220),

Gene: Shoya_50 Start: 29154, Stop: 29441, Start Num: 13

Candidate Starts for Shoya_50:

 $(3,\,28866),\,(4,\,28983),\,(8,\,29088),\,(10,\,29127),\,(\text{Start:}\,\,13\,\,@\,29154\,\,\text{has}\,\,3\,\,\text{MA's}),\,(20,\,29292),\,(21,\,282666),\,(21,\,28266),\,(21,\,28266),\,(21,\,28266),\,(21,\,28266),\,(21,\,28266),\,(21,\,28266),\,(21,\,28266)$

29301), (22, 29313), (23, 29325),

Gene: Zucker_35 Start: 27460, Stop: 27846, Start Num: 7

Candidate Starts for Zucker_35:

(Start: 7 @27460 has 1 MA's), (23, 27733), (25, 27748), (29, 27787),