

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 156846 Report

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

Pham number 156846 has 10 members, 3 are drafts.

Phages represented in each track:

Track 1 : AreFloNak\_49, Nivinsha\_48

Track 2: DevitoJr 47

Track 3 : ScienceWizSam\_48

Track 4 : CapnMurica\_45

• Track 5 : Ingrid 62, Loretta 59

Track 6 : Paella\_201, Elver\_197, Qui\_201

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

The start number called the most often in the published annotations is 3, it was called in 3 of the 7 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

AreFloNak\_49, CapnMurica\_45, DevitoJr\_47, Nivinsha\_48, ScienceWizSam\_48,

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

•

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

Elver\_197, Ingrid\_62, Loretta\_59, Paella\_201, Qui\_201,

### Summary by start number:

#### Start 3:

- Found in 5 of 10 (50.0%) of genes in pham
- Manual Annotations of this start: 3 of 7
- Called 100.0% of time when present
- Phage (with cluster) where this start called: AreFloNak\_49 (AU1), CapnMurica\_45 (AU1), DevitoJr\_47 (AU1), Nivinsha\_48 (AU1), ScienceWizSam\_48 (AU1),

#### Start 4:

- Found in 3 of 10 (30.0%) of genes in pham
- Manual Annotations of this start: 2 of 7
- Called 100.0% of time when present

• Phage (with cluster) where this start called: Elver\_197 (FK), Paella\_201 (FK), Qui 201 (FK),

### Start 5:

- Found in 6 of 10 (60.0%) of genes in pham
- Manual Annotations of this start: 2 of 7
- Called 33.3% of time when present
- Phage (with cluster) where this start called: Ingrid\_62 (AU3), Loretta\_59 (AU3),

### Summary by clusters:

There are 3 clusters represented in this pham: AU1, AU3, FK,

Info for manual annotations of cluster AU1:

•Start number 3 was manually annotated 3 times for cluster AU1.

Info for manual annotations of cluster AU3:

•Start number 5 was manually annotated 2 times for cluster AU3.

Info for manual annotations of cluster FK:

•Start number 4 was manually annotated 2 times for cluster FK.

#### Gene Information:

Gene: AreFloNak 49 Start: 34627, Stop: 34830, Start Num: 3

Candidate Starts for AreFloNak\_49:

(Start: 3 @34627 has 3 MA's), (Start: 5 @34639 has 2 MA's), (10, 34723), (11, 34765),

Gene: CapnMurica\_45 Start: 35410, Stop: 35613, Start Num: 3

Candidate Starts for CapnMurica\_45: (Start: 3 @35410 has 3 MA's), (11, 35548),

Gene: DevitoJr 47 Start: 34848, Stop: 35051, Start Num: 3

Candidate Starts for DevitoJr\_47:

(1, 34815), (Start: 3 @34848 has 3 MA's), (Start: 5 @34860 has 2 MA's), (9, 34902), (10, 34944), (11, 34986),

Gene: Elver\_197 Start: 94814, Stop: 94990, Start Num: 4

Candidate Starts for Elver 197:

(2, 94796), (Start: 4 @94814 has 2 MA's), (7, 94853),

Gene: Ingrid\_62 Start: 42753, Stop: 42935, Start Num: 5

Candidate Starts for Ingrid\_62:

(Start: 5 @ 42753 has 2 MA's), (6, 42780), (8, 42789), (10, 42837),

Gene: Loretta\_59 Start: 42753, Stop: 42935, Start Num: 5

Candidate Starts for Loretta 59:

(Start: 5 @ 42753 has 2 MA's), (6, 42780), (8, 42789), (10, 42837),

Gene: Nivinsha\_48 Start: 34627, Stop: 34830, Start Num: 3

Candidate Starts for Nivinsha\_48:

(Start: 3 @34627 has 3 MA's), (Start: 5 @34639 has 2 MA's), (10, 34723), (11, 34765),

Gene: Paella\_201 Start: 95690, Stop: 95866, Start Num: 4

Candidate Starts for Paella\_201:

(2, 95672), (Start: 4 @95690 has 2 MA's), (7, 95729),

Gene: Qui\_201 Start: 95687, Stop: 95863, Start Num: 4

Candidate Starts for Qui\_201:

(2, 95669), (Start: 4 @95687 has 2 MA's), (7, 95726),

Gene: ScienceWizSam\_48 Start: 34735, Stop: 34938, Start Num: 3

Candidate Starts for ScienceWizSam\_48:

(Start: 3 @34735 has 3 MA's), (Start: 5 @34747 has 2 MA's), (9, 34789), (10, 34831), (11, 34873),