

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 74923 Report

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

Pham number 74923 has 7 members, 1 are drafts.

Phages represented in each track:

Track 1 : Frankenweenie\_95

• Track 2 : Kela\_85, JustBecause\_84

Track 3 : Nirvana\_94

Track 4 : Kradal\_87, EhyElimayoE\_87, Satis\_87

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

The start number called the most often in the published annotations is 4, it was called in 6 of the 6 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

• EhyElimayoE\_87, Frankenweenie\_95, JustBecause\_84, Kela\_85, Kradal\_87, Satis\_87,

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

Nirvana\_94,

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

## Summary by start number:

### Start 3:

- Found in 2 of 7 (28.6%) of genes in pham
- No Manual Annotations of this start.
- Called 50.0% of time when present
- Phage (with cluster) where this start called: Nirvana\_94 (BM),

#### Start 4:

- Found in 7 of 7 (100.0%) of genes in pham
- Manual Annotations of this start: 6 of 6
- Called 85.7% of time when present
- Phage (with cluster) where this start called: EhyElimayoE\_87 (BM),
  Frankenweenie\_95 (BM), JustBecause\_84 (BM), Kela\_85 (BM), Kradal\_87 (BM),

Satis\_87 (BM),

### Summary by clusters:

There is one cluster represented in this pham: BM

Info for manual annotations of cluster BM:

•Start number 4 was manually annotated 6 times for cluster BM.

#### Gene Information:

Gene: EhyElimayoE\_87 Start: 61359, Stop: 61177, Start Num: 4

Candidate Starts for EhyElimayoE\_87:

(Start: 4 @61359 has 6 MA's), (5, 61356), (8, 61302), (9, 61296), (10, 61290), (11, 61245), (13, 61206), (14, 61203), (16, 61188),

Gene: Frankenweenie\_95 Start: 65470, Stop: 65285, Start Num: 4

Candidate Starts for Frankenweenie 95:

(1, 65617), (3, 65479), (Start: 4 @65470 has 6 MA's), (8, 65413), (9, 65407), (12, 65326), (15, 65308), (16, 65299),

Gene: JustBecause\_84 Start: 59474, Stop: 59289, Start Num: 4

Candidate Starts for JustBecause\_84:

(2, 59519), (Start: 4 @59474 has 6 MA's), (6, 59465), (7, 59444), (8, 59417), (9, 59411), (15, 59312), (16, 59303),

Gene: Kela\_85 Start: 59339, Stop: 59154, Start Num: 4

Candidate Starts for Kela\_85:

(2, 59384), (Start: 4 @59339 has 6 MA's), (6, 59330), (7, 59309), (8, 59282), (9, 59276), (15, 59177), (16, 59168),

Gene: Kradal\_87 Start: 61359, Stop: 61177, Start Num: 4

Candidate Starts for Kradal 87:

(Start: 4 @61359 has 6 MA's), (5, 61356), (8, 61302), (9, 61296), (10, 61290), (11, 61245), (13, 61206), (14, 61203), (16, 61188),

Gene: Nirvana 94 Start: 63884, Stop: 63690, Start Num: 3

Candidate Starts for Nirvana 94:

(3, 63884), (Start: 4 @63875 has 6 MA's), (8, 63818), (9, 63812), (15, 63713), (16, 63704),

Gene: Satis 87 Start: 61355, Stop: 61173, Start Num: 4

Candidate Starts for Satis\_87:

 $(Start: 4\ @61355\ has\ 6\ MA's),\ (5,\ 61352),\ (8,\ 61298),\ (9,\ 61292),\ (10,\ 61286),\ (11,\ 61241),\ (13,\ 61241),\ (1$ 

61202), (14, 61199), (16, 61184),