

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 88292 Report

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

Pham number 88292 has 6 members, 0 are drafts.

Phages represented in each track:

Track 1: Puppers 43, Widow 44

Track 2 : Gustav\_48Track 3 : Morrissey\_48

Track 4 : Trine\_43Track 5 : Mahdia\_45

# 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 4 of the 6 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

Gustav\_48, Morrissey\_48, Puppers\_43, Widow\_44,

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

• Trine\_43,

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

Mahdia 45.

### Summary by start number:

#### Start 3:

- Found in 1 of 6 (16.7%) of genes in pham
- Manual Annotations of this start: 1 of 6
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Mahdia\_45 (CD),

### Start 4:

- Found in 5 of 6 (83.3%) of genes in pham
- Manual Annotations of this start: 4 of 6
- Called 80.0% of time when present
- Phage (with cluster) where this start called: Gustav\_48 (CD), Morrissey\_48 (CD), Puppers 43 (CD), Widow 44 (CD),

#### Start 5:

- Found in 1 of 6 (16.7%) of genes in pham
- Manual Annotations of this start: 1 of 6
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Trine\_43 (CD),

# **Summary by clusters:**

There is one cluster represented in this pham: CD

Info for manual annotations of cluster CD:

- •Start number 3 was manually annotated 1 time for cluster CD.
- •Start number 4 was manually annotated 4 times for cluster CD.
- •Start number 5 was manually annotated 1 time for cluster CD.

### Gene Information:

Gene: Gustav 48 Start: 36491, Stop: 36225, Start Num: 4

Candidate Starts for Gustav 48:

(Start: 4 @36491 has 4 MA's), (8, 36434), (12, 36416), (13, 36410), (14, 36404), (16, 36371), (20, 36329), (26, 36257),

Gene: Mahdia\_45 Start: 35239, Stop: 34958, Start Num: 3

Candidate Starts for Mahdia 45:

(Start: 3 @35239 has 1 MA's), (11, 35152), (12, 35149), (16, 35104), (18, 35074), (23, 35020), (27, 34969),

Gene: Morrissey\_48 Start: 37813, Stop: 37544, Start Num: 4

Candidate Starts for Morrissey 48:

(2, 37900), (Start: 4 @37813 has 4 MA's), (6, 37768), (7, 37762), (12, 37735), (17, 37681), (22, 37630),

Gene: Puppers\_43 Start: 34902, Stop: 34633, Start Num: 4

Candidate Starts for Puppers\_43:

(1, 35379), (Start: 4 @34902 has 4 MA's), (15, 34806), (19, 34746), (20, 34740),

Gene: Trine\_43 Start: 35123, Stop: 34851, Start Num: 5

Candidate Starts for Trine 43:

(Start: 4 @ 35126 has 4 MA's), (Start: 5 @ 35123 has 1 MA's), (9, 35066), (10, 35063), (15, 35030), (19, 34970), (21, 34952), (24, 34919), (25, 34913),

Gene: Widow\_44 Start: 35546, Stop: 35277, Start Num: 4

Candidate Starts for Widow 44:

(1, 36023), (Start: 4 @35546 has 4 MA's), (15, 35450), (19, 35390), (20, 35384),