

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 4548 Report

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

Pham number 4548 has 20 members, 1 are drafts.

Phages represented in each track:

Track 1 : Mercedes\_47

• Track 2 : Juanyo 51

- Track 3 : ChikPic\_54, Andromedas\_54, ColaCorta\_54, Eleri\_54, Glamour\_53, Saratos\_54
- Track 4 : Shamu\_54, MCubed\_54, Zenitsu\_54, Finny\_55, Sansa\_52
- Track 5 : CaptainRex\_52, Fulton\_52, Zepp\_52, Hasitha\_52, Librie\_52,

QuadZero\_52

Track 6 : WilliamStrong\_51

# 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 13 of the 19 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

• Andromedas\_54, ChikPic\_54, ColaCorta\_54, Eleri\_54, Finny\_55, Glamour\_53, Juanyo\_51, MCubed\_54, Sansa\_52, Saratos\_54, Shamu\_54, WilliamStrong\_51, Zenitsu\_54,

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

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

CaptainRex\_52, Fulton\_52, Hasitha\_52, Librie\_52, Mercedes\_47, QuadZero\_52, Zepp\_52,

## Summary by start number:

### Start 2:

- Found in 7 of 20 (35.0%) of genes in pham
- Manual Annotations of this start: 6 of 19
- Called 100.0% of time when present
- Phage (with cluster) where this start called: CaptainRex\_52 (EA5), Fulton\_52 (EA5), Hasitha\_52 (EA5), Librie\_52 (EA5), Mercedes\_47 (EA), QuadZero\_52 (EA5),

Zepp\_52 (EA5),

### Start 3:

- Found in 13 of 20 (65.0%) of genes in pham
- Manual Annotations of this start: 13 of 19
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Andromedas\_54 (EA2), ChikPic\_54 (EA2), ColaCorta\_54 (EA2), Eleri\_54 (EA2), Finny\_55 (EA2), Glamour\_53 (EA2), Juanyo\_51 (EA10), MCubed\_54 (EA2), Sansa\_52 (EA2), Saratos\_54 (EA2), Shamu\_54 (EA2), WilliamStrong\_51 (EA6), Zenitsu\_54 (EA2),

## **Summary by clusters:**

There are 5 clusters represented in this pham: EA, EA2, EA5, EA10, EA6,

Info for manual annotations of cluster EA:

•Start number 2 was manually annotated 1 time for cluster EA.

Info for manual annotations of cluster EA10:

•Start number 3 was manually annotated 1 time for cluster EA10.

Info for manual annotations of cluster EA2:

•Start number 3 was manually annotated 11 times for cluster EA2.

Info for manual annotations of cluster EA5:

•Start number 2 was manually annotated 5 times for cluster EA5.

Info for manual annotations of cluster EA6:

•Start number 3 was manually annotated 1 time for cluster EA6.

### Gene Information:

Gene: Andromedas 54 Start: 36830, Stop: 36657, Start Num: 3

Candidate Starts for Andromedas\_54:

(Start: 3 @36830 has 13 MA's), (6, 36740), (9, 36680),

Gene: CaptainRex 52 Start: 35369, Stop: 35205, Start Num: 2

Candidate Starts for CaptainRex\_52:

(Start: 2 @35369 has 6 MA's),

Gene: ChikPic 54 Start: 36639, Stop: 36466, Start Num: 3

Candidate Starts for ChikPic\_54:

(Start: 3 @36639 has 13 MA's), (6, 36549), (9, 36489),

Gene: ColaCorta\_54 Start: 36830, Stop: 36657, Start Num: 3

Candidate Starts for ColaCorta 54:

(Start: 3 @36830 has 13 MA's), (6, 36740), (9, 36680),

Gene: Eleri 54 Start: 36675, Stop: 36502, Start Num: 3

Candidate Starts for Eleri 54:

(Start: 3 @ 36675 has 13 MA's), (6, 36585), (9, 36525),

Gene: Finny\_55 Start: 36623, Stop: 36450, Start Num: 3

Candidate Starts for Finny\_55:

(Start: 3 @ 36623 has 13 MA's), (6, 36533), (9, 36473),

Gene: Fulton 52 Start: 35370, Stop: 35206, Start Num: 2

Candidate Starts for Fulton\_52: (Start: 2 @35370 has 6 MA's),

Gene: Glamour\_53 Start: 36533, Stop: 36360, Start Num: 3

Candidate Starts for Glamour 53:

(Start: 3 @ 36533 has 13 MA's), (6, 36443), (9, 36383),

Gene: Hasitha\_52 Start: 35382, Stop: 35218, Start Num: 2

Candidate Starts for Hasitha\_52: (Start: 2 @35382 has 6 MA's),

Gene: Juanyo\_51 Start: 35601, Stop: 35431, Start Num: 3

Candidate Starts for Juanyo 51:

(Start: 3 @35601 has 13 MA's), (6, 35514), (8, 35508),

Gene: Librie\_52 Start: 35369, Stop: 35205, Start Num: 2

Candidate Starts for Librie\_52: (Start: 2 @35369 has 6 MA's),

Gene: MCubed\_54 Start: 36654, Stop: 36481, Start Num: 3

Candidate Starts for MCubed\_54:

(Start: 3 @ 36654 has 13 MA's), (6, 36564), (9, 36504),

Gene: Mercedes\_47 Start: 35516, Stop: 35352, Start Num: 2

Candidate Starts for Mercedes\_47:

(Start: 2 @35516 has 6 MA's), (7, 35417), (8, 35414),

Gene: QuadZero\_52 Start: 35473, Stop: 35309, Start Num: 2

Candidate Starts for QuadZero\_52: (Start: 2 @35473 has 6 MA's),

Gene: Sansa\_52 Start: 36615, Stop: 36442, Start Num: 3

Candidate Starts for Sansa 52:

(Start: 3 @ 36615 has 13 MA's), (6, 36525), (9, 36465),

Gene: Saratos\_54 Start: 36659, Stop: 36486, Start Num: 3

Candidate Starts for Saratos\_54:

(Start: 3 @ 36659 has 13 MA's), (6, 36569), (9, 36509),

Gene: Shamu\_54 Start: 36548, Stop: 36375, Start Num: 3

Candidate Starts for Shamu\_54:

(Start: 3 @ 36548 has 13 MA's), (6, 36458), (9, 36398),

Gene: WilliamStrong 51 Start: 35918, Stop: 35757, Start Num: 3

Candidate Starts for WilliamStrong\_51:

(1, 35933), (Start: 3 @ 35918 has 13 MA's), (4, 35873), (5, 35831), (7, 35825), (8, 35822),

Gene: Zenitsu\_54 Start: 36659, Stop: 36486, Start Num: 3

Candidate Starts for Zenitsu\_54:

(Start: 3 @ 36659 has 13 MA's), (6, 36569), (9, 36509),

Gene: Zepp\_52 Start: 35429, Stop: 35265, Start Num: 2

Candidate Starts for Zepp\_52: (Start: 2 @35429 has 6 MA's),