				6	\
1: Blinn1_37 + 5					
			6	6	
2: WlinderPhul_36					
			<del>ر</del> ا	6	
2) Hoyama 26 + 9					
B: Hexamo_36 + 8					
			<b>6</b>	6	
4: Hammer_36					

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 4368 Report

This analysis was run 04/05/24 on database version 557.

Pham number 4368 has 17 members, 0 are drafts.

Phages represented in each track:

- Track 1: Blinn1\_37, Kazan\_37, Indra\_37, Roksolana\_37, Blue7\_37, JewelBug\_37
- Track 2 : WunderPhul\_36
- Track 3: Hexamo\_36, Artemis2UCLA\_36, CloudWang3\_36, Zaka\_36, Tucker\_36, Rifter 36, Yokurt 36, Jeffabunny 36, Zulu 36
- Track 4 : Hammer\_36

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

The start number called the most often in the published annotations is 5, it was called in 10 of the 17 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

• Artemis2UCLA\_36, CloudWang3\_36, Hammer\_36, Hexamo\_36, Jeffabunny\_36, Rifter\_36, Tucker\_36, Yokurt\_36, Zaka\_36, Zulu\_36,

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

WunderPhul 36,

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

Blinn1\_37, Blue7\_37, Indra\_37, JewelBug\_37, Kazan\_37, Roksolana\_37,

### **Summary by start number:**

#### Start 4:

- Found in 1 of 17 (5.9%) of genes in pham
- Manual Annotations of this start: 1 of 17
- Called 100.0% of time when present
- Phage (with cluster) where this start called: WunderPhul 36 (A6),

#### Start 5:

- Found in 11 of 17 (64.7%) of genes in pham
- Manual Annotations of this start: 10 of 17
- Called 90.9% of time when present

Phage (with cluster) where this start called: Artemis2UCLA\_36 (A6),
CloudWang3\_36 (A6), Hammer\_36 (A6), Hexamo\_36 (A6), Jeffabunny\_36 (A6),
Rifter\_36 (A6), Tucker\_36 (A6), Yokurt\_36 (A6), Zaka\_36 (A6),
Zulu\_36 (A6),

#### Start 6:

- Found in 17 of 17 (100.0%) of genes in pham
- Manual Annotations of this start: 6 of 17
- Called 35.3% of time when present
- Phage (with cluster) where this start called: Blinn1\_37 (A6), Blue7\_37 (A6), Indra\_37 (A6), JewelBug\_37 (A6), Kazan\_37 (A6), Roksolana\_37 (A6),

## **Summary by clusters:**

There is one cluster represented in this pham: A6

Info for manual annotations of cluster A6:

- •Start number 4 was manually annotated 1 time for cluster A6.
- •Start number 5 was manually annotated 10 times for cluster A6.
- •Start number 6 was manually annotated 6 times for cluster A6.

#### Gene Information:

Gene: Artemis2UCLA\_36 Start: 24184, Stop: 24378, Start Num: 5

Candidate Starts for Artemis2UCLA 36:

(Start: 5 @24184 has 10 MA's), (Start: 6 @24232 has 6 MA's), (7, 24319),

Gene: Blinn1\_37 Start: 24624, Stop: 24770, Start Num: 6

Candidate Starts for Blinn1\_37:

(Start: 6 @24624 has 6 MA's), (7, 24711),

Gene: Blue7 37 Start: 24548, Stop: 24694, Start Num: 6

Candidate Starts for Blue7 37:

(Start: 6 @ 24548 has 6 MA's), (7, 24635),

Gene: CloudWang3\_36 Start: 24284, Stop: 24478, Start Num: 5

Candidate Starts for CloudWang3 36:

(Start: 5 @24284 has 10 MA's), (Start: 6 @24332 has 6 MA's), (7, 24419),

Gene: Hammer\_36 Start: 24311, Stop: 24505, Start Num: 5

Candidate Starts for Hammer 36:

(Start: 5 @24311 has 10 MA's), (Start: 6 @24359 has 6 MA's), (7, 24446),

Gene: Hexamo\_36 Start: 24256, Stop: 24450, Start Num: 5

Candidate Starts for Hexamo\_36:

(Start: 5 @24256 has 10 MA's), (Start: 6 @24304 has 6 MA's), (7, 24391),

Gene: Indra 37 Start: 24560, Stop: 24706, Start Num: 6

Candidate Starts for Indra 37:

(Start: 6 @24560 has 6 MA's), (7, 24647),

Gene: Jeffabunny\_36 Start: 24308, Stop: 24502, Start Num: 5

Candidate Starts for Jeffabunny\_36:

(Start: 5 @24308 has 10 MA's), (Start: 6 @24356 has 6 MA's), (7, 24443),

Gene: JewelBug\_37 Start: 24563, Stop: 24709, Start Num: 6

Candidate Starts for JewelBug\_37:

(Start: 6 @ 24563 has 6 MA's), (7, 24650),

Gene: Kazan 37 Start: 24564, Stop: 24710, Start Num: 6

Candidate Starts for Kazan\_37:

(Start: 6 @ 24564 has 6 MA's), (7, 24651),

Gene: Rifter\_36 Start: 24273, Stop: 24467, Start Num: 5

Candidate Starts for Rifter\_36:

(Start: 5 @24273 has 10 MA's), (Start: 6 @24321 has 6 MA's), (7, 24408),

Gene: Roksolana\_37 Start: 24572, Stop: 24718, Start Num: 6

Candidate Starts for Roksolana\_37: (Start: 6 @24572 has 6 MA's), (7, 24659),

Gene: Tucker\_36 Start: 24300, Stop: 24494, Start Num: 5

Candidate Starts for Tucker\_36:

(Start: 5 @24300 has 10 MA's), (Start: 6 @24348 has 6 MA's), (7, 24435),

Gene: WunderPhul\_36 Start: 24209, Stop: 24475, Start Num: 4

Candidate Starts for WunderPhul\_36:

(1, 24104), (2, 24116), (3, 24179), (Start: 4 @24209 has 1 MA's), (Start: 5 @24281 has 10 MA's),

(Start: 6 @24329 has 6 MA's), (7, 24416),

Gene: Yokurt\_36 Start: 24282, Stop: 24476, Start Num: 5

Candidate Starts for Yokurt\_36:

(Start: 5 @24282 has 10 MA's), (Start: 6 @24330 has 6 MA's), (7, 24417),

Gene: Zaka\_36 Start: 24282, Stop: 24476, Start Num: 5

Candidate Starts for Zaka 36:

(Start: 5 @24282 has 10 MA's), (Start: 6 @24330 has 6 MA's), (7, 24417),

Gene: Zulu\_36 Start: 24281, Stop: 24475, Start Num: 5

Candidate Starts for Zulu\_36:

(Start: 5 @24281 has 10 MA's), (Start: 6 @24329 has 6 MA's), (7, 24416),