•	ν		<b>b</b>	6
4. Casina 20 . 2				
1: Casino_20 + 2			-	'
	<sup>3</sup>		» бу	61
2: Araxxi_21				
			<b>\</b>	6
3: Hannabella_21				
	ტ		k 6	
4: Burro_21				
	ng.		<b>k</b> 6	1
5: DoTi_21				
			<b>b</b>	6 .
				Ĭ
6: Gshelby <mark>23_</mark> 20				

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 7112 Report

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

Pham number 7112 has 8 members, 2 are drafts.

Phages represented in each track:

Track 1 : Casino\_20, Arete\_22, Scruffy\_22

Track 2 : Araxxi\_21

• Track 3 : Hannabella 21

Track 4 : Burro\_21Track 5 : DoTi 21

Track 6 : Gshelby23\_20

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

The start number called the most often in the published annotations is 2, it was called in 2 of the 6 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

Arete\_22, Casino\_20, Hannabella\_21, Scruffy\_22,

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

Gshelby23\_20,

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

Araxxi\_21, Burro\_21, DoTi\_21,

## Summary by start number:

#### Start 1:

- Found in 3 of 8 ( 37.5% ) of genes in pham
- Manual Annotations of this start: 2 of 6
- Called 66.7% of time when present
- Phage (with cluster) where this start called: Burro\_21 (EM1), Gshelby23\_20 (EM1),

#### Start 2:

- Found in 5 of 8 (62.5%) of genes in pham
- Manual Annotations of this start: 2 of 6
- Called 80.0% of time when present

• Phage (with cluster) where this start called: Arete\_22 (EM1), Casino\_20 (EM1), Hannabella\_21 (EM1), Scruffy\_22 (EM1),

## Start 3:

- Found in 3 of 8 ( 37.5% ) of genes in pham
- Manual Annotations of this start: 2 of 6
- Called 66.7% of time when present
- Phage (with cluster) where this start called: Araxxi\_21 (EM1), DoTi\_21 (EM1),

### Summary by clusters:

There is one cluster represented in this pham: EM1

Info for manual annotations of cluster EM1:

- •Start number 1 was manually annotated 2 times for cluster EM1.
- •Start number 2 was manually annotated 2 times for cluster EM1.
- Start number 3 was manually annotated 2 times for cluster EM1.

#### Gene Information:

Gene: Araxxi\_21 Start: 15841, Stop: 15455, Start Num: 3

Candidate Starts for Araxxi 21:

(Start: 3 @ 15841 has 2 MA's), (4, 15628), (5, 15622), (6, 15526), (7, 15520),

Gene: Arete\_22 Start: 15765, Stop: 15385, Start Num: 2

Candidate Starts for Arete\_22:

(Start: 2 @ 15765 has 2 MA's), (4, 15555), (6, 15453),

Gene: Burro\_21 Start: 15074, Stop: 14640, Start Num: 1

Candidate Starts for Burro 21:

(Start: 1 @15074 has 2 MA's), (Start: 3 @15017 has 2 MA's), (4, 14813), (5, 14807),

Gene: Casino 20 Start: 15599, Stop: 15219, Start Num: 2

Candidate Starts for Casino\_20:

(Start: 2 @ 15599 has 2 MA's), (4, 15389), (6, 15287),

Gene: DoTi 21 Start: 15832, Stop: 15446, Start Num: 3

Candidate Starts for DoTi 21:

(Start: 3 @ 15832 has 2 MA's), (4, 15619), (5, 15613), (7, 15511),

Gene: Gshelby23 20 Start: 15768, Stop: 15334, Start Num: 1

Candidate Starts for Gshelby23\_20:

(Start: 1 @15768 has 2 MA's), (Start: 2 @15714 has 2 MA's), (4, 15504), (6, 15402),

Gene: Hannabella\_21 Start: 15597, Stop: 15217, Start Num: 2

Candidate Starts for Hannabella 21:

(Start: 1 @15651 has 2 MA's), (Start: 2 @15597 has 2 MA's), (4, 15387), (6, 15285),

Gene: Scruffy\_22 Start: 15996, Stop: 15616, Start Num: 2

Candidate Starts for Scruffy 22:

(Start: 2 @ 15996 has 2 MA's), (4, 15786), (6, 15684),