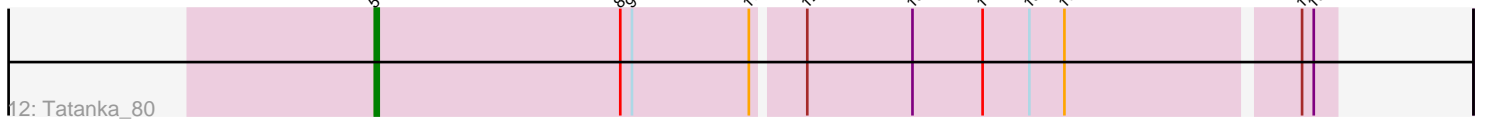
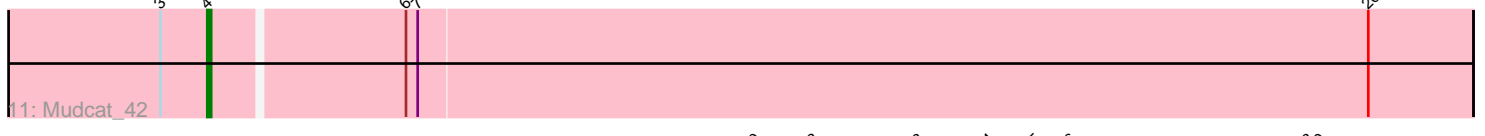
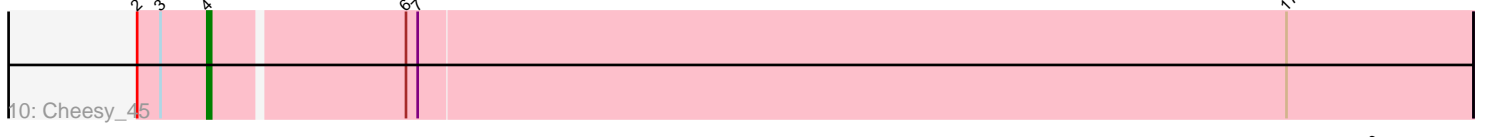
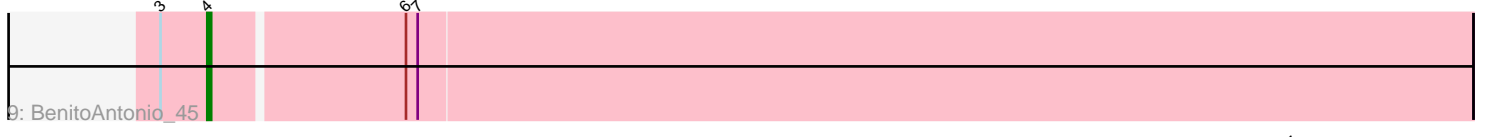
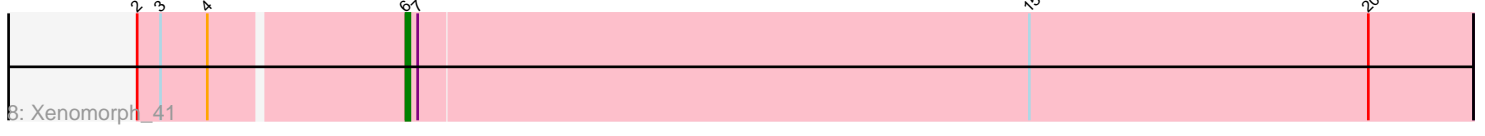
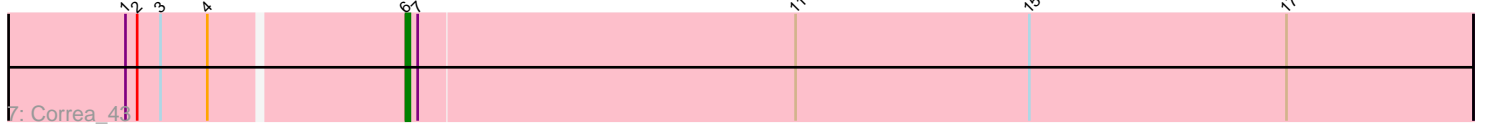
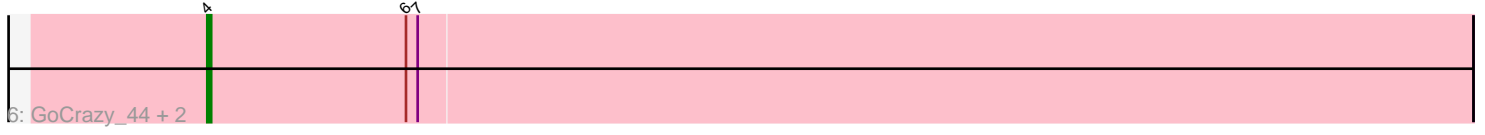
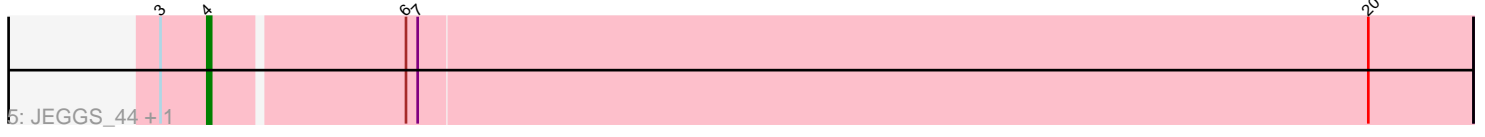
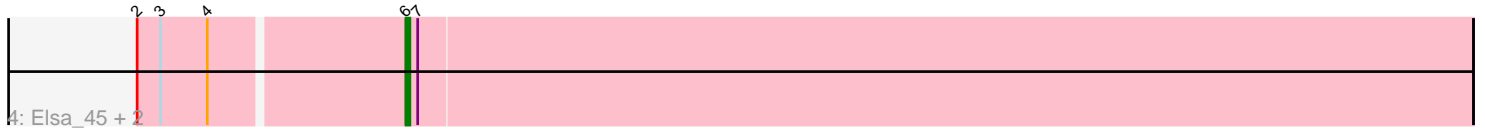
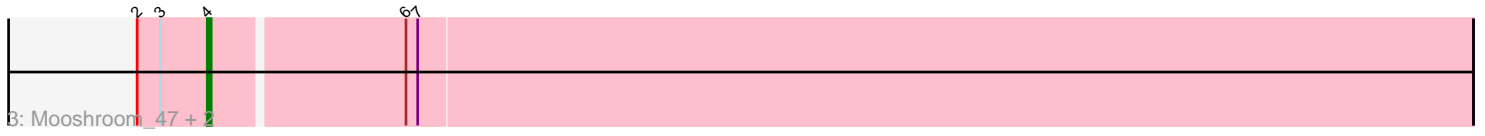
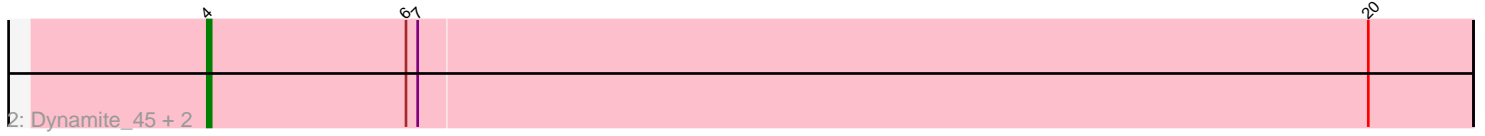
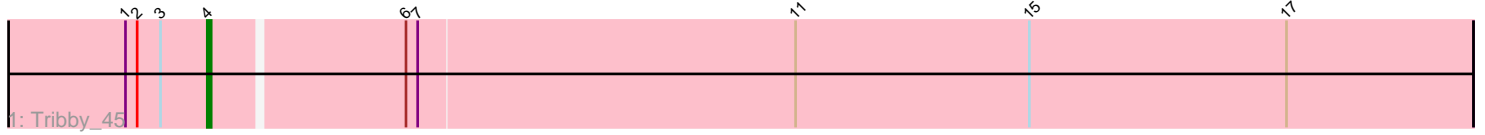


Pham 171766



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 171766 Report

This analysis was run 07/10/24 on database version 566.

Pham number 171766 has 21 members, 1 are drafts.

Phages represented in each track:

- Track 1 : Tribby\_45
- Track 2 : Dynamite\_45, NapoleonB\_45, Circum\_47
- Track 3 : Mooshroom\_47, Kardesai\_46, Benllo\_44
- Track 4 : Elsa\_45, Arcadia\_45, Nason\_45
- Track 5 : JEGGS\_44, Heisenberger\_44
- Track 6 : GoCrazy\_44, Hankly\_44, KeaneyLin\_44
- Track 7 : Correa\_43
- Track 8 : Xenomorph\_41
- Track 9 : BenitoAntonio\_45
- Track 10 : Cheesy\_45
- Track 11 : Mudcat\_42
- Track 12 : Tatanka\_80

### ***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 14 of the 20 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

- BenitoAntonio\_45, Benllo\_44, Cheesy\_45, Circum\_47, Dynamite\_45, GoCrazy\_44, Hankly\_44, Heisenberger\_44, JEGGS\_44, Kardesai\_46, KeaneyLin\_44, Mooshroom\_47, Mudcat\_42, NapoleonB\_45, Tribby\_45,

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

- Arcadia\_45, Correa\_43, Elsa\_45, Nason\_45, Xenomorph\_41,

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

- Tatanka\_80,

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

Start 4:

- Found in 20 of 21 ( 95.2% ) of genes in pham
- Manual Annotations of this start: 14 of 20

- Called 75.0% of time when present
- Phage (with cluster) where this start called: BenitoAntonio\_45 (AM), Benllo\_44 (AM), Cheesy\_45 (AM), Circum\_47 (AM), Dynamite\_45 (AM), GoCrazy\_44 (AM), Hankly\_44 (AM), Heisenberger\_44 (AM), JEGGS\_44 (AM), Kardesai\_46 (AM), KeaneyLin\_44 (AM), Mooshroom\_47 (AM), Mudcat\_42 (AM), NapoleonB\_45 (AM), Tribby\_45 (AM),

#### Start 5:

- Found in 1 of 21 ( 4.8% ) of genes in pham
- Manual Annotations of this start: 1 of 20
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Tatanka\_80 (AU1),

#### Start 6:

- Found in 20 of 21 ( 95.2% ) of genes in pham
- Manual Annotations of this start: 5 of 20
- Called 25.0% of time when present
- Phage (with cluster) where this start called: Arcadia\_45 (AM), Correa\_43 (AM), Elsa\_45 (AM), Nason\_45 (AM), Xenomorph\_41 (AM),

### Summary by clusters:

There are 2 clusters represented in this pham: AU1, AM,

Info for manual annotations of cluster AM:

- Start number 4 was manually annotated 14 times for cluster AM.
- Start number 6 was manually annotated 5 times for cluster AM.

Info for manual annotations of cluster AU1:

- Start number 5 was manually annotated 1 time for cluster AU1.

### **Gene Information:**

Gene: Arcadia\_45 Start: 30887, Stop: 31159, Start Num: 6

Candidate Starts for Arcadia\_45:

(2, 30821), (3, 30827), (Start: 4 @30839 has 14 MA's), (Start: 6 @30887 has 5 MA's), (7, 30890),

Gene: BenitoAntonio\_45 Start: 30416, Stop: 30736, Start Num: 4

Candidate Starts for BenitoAntonio\_45:

(3, 30404), (Start: 4 @30416 has 14 MA's), (Start: 6 @30464 has 5 MA's), (7, 30467),

Gene: Benllo\_44 Start: 31100, Stop: 31420, Start Num: 4

Candidate Starts for Benllo\_44:

(2, 31082), (3, 31088), (Start: 4 @31100 has 14 MA's), (Start: 6 @31148 has 5 MA's), (7, 31151),

Gene: Cheesy\_45 Start: 30537, Stop: 30857, Start Num: 4

Candidate Starts for Cheesy\_45:

(2, 30519), (3, 30525), (Start: 4 @30537 has 14 MA's), (Start: 6 @30585 has 5 MA's), (7, 30588), (17, 30810),

Gene: Circum\_47 Start: 31247, Stop: 31570, Start Num: 4

Candidate Starts for Circum\_47:

(Start: 4 @31247 has 14 MA's), (Start: 6 @31298 has 5 MA's), (7, 31301), (20, 31544),

Gene: Correa\_43 Start: 29770, Stop: 30042, Start Num: 6

Candidate Starts for Correa\_43:

(1, 29701), (2, 29704), (3, 29710), (Start: 4 @29722 has 14 MA's), (Start: 6 @29770 has 5 MA's), (7, 29773), (11, 29869), (15, 29929), (17, 29995),

Gene: Dynamite\_45 Start: 30799, Stop: 31122, Start Num: 4

Candidate Starts for Dynamite\_45:

(Start: 4 @30799 has 14 MA's), (Start: 6 @30850 has 5 MA's), (7, 30853), (20, 31096),

Gene: Elsa\_45 Start: 30887, Stop: 31159, Start Num: 6

Candidate Starts for Elsa\_45:

(2, 30821), (3, 30827), (Start: 4 @30839 has 14 MA's), (Start: 6 @30887 has 5 MA's), (7, 30890),

Gene: GoCrazy\_44 Start: 30725, Stop: 31048, Start Num: 4

Candidate Starts for GoCrazy\_44:

(Start: 4 @30725 has 14 MA's), (Start: 6 @30776 has 5 MA's), (7, 30779),

Gene: Hankly\_44 Start: 30026, Stop: 30349, Start Num: 4

Candidate Starts for Hankly\_44:

(Start: 4 @30026 has 14 MA's), (Start: 6 @30077 has 5 MA's), (7, 30080),

Gene: Heisenberger\_44 Start: 30280, Stop: 30600, Start Num: 4

Candidate Starts for Heisenberger\_44:

(3, 30268), (Start: 4 @30280 has 14 MA's), (Start: 6 @30328 has 5 MA's), (7, 30331), (20, 30574),

Gene: JEGGS\_44 Start: 30334, Stop: 30654, Start Num: 4

Candidate Starts for JEGGS\_44:

(3, 30322), (Start: 4 @30334 has 14 MA's), (Start: 6 @30382 has 5 MA's), (7, 30385), (20, 30628),

Gene: Kardesai\_46 Start: 31000, Stop: 31320, Start Num: 4

Candidate Starts for Kardesai\_46:

(2, 30982), (3, 30988), (Start: 4 @31000 has 14 MA's), (Start: 6 @31048 has 5 MA's), (7, 31051),

Gene: KeaneyLin\_44 Start: 30725, Stop: 31048, Start Num: 4

Candidate Starts for KeaneyLin\_44:

(Start: 4 @30725 has 14 MA's), (Start: 6 @30776 has 5 MA's), (7, 30779),

Gene: Mooshroom\_47 Start: 31000, Stop: 31320, Start Num: 4

Candidate Starts for Mooshroom\_47:

(2, 30982), (3, 30988), (Start: 4 @31000 has 14 MA's), (Start: 6 @31048 has 5 MA's), (7, 31051),

Gene: Mudcat\_42 Start: 31693, Stop: 32013, Start Num: 4

Candidate Starts for Mudcat\_42:

(3, 31681), (Start: 4 @31693 has 14 MA's), (Start: 6 @31741 has 5 MA's), (7, 31744), (20, 31987),

Gene: NapoleonB\_45 Start: 30799, Stop: 31122, Start Num: 4

Candidate Starts for NapoleonB\_45:

(Start: 4 @30799 has 14 MA's), (Start: 6 @30850 has 5 MA's), (7, 30853), (20, 31096),

Gene: Nason\_45 Start: 30887, Stop: 31159, Start Num: 6

Candidate Starts for Nason\_45:

(2, 30821), (3, 30827), (Start: 4 @30839 has 14 MA's), (Start: 6 @30887 has 5 MA's), (7, 30890),

Gene: Tatanka\_80 Start: 52808, Stop: 53047, Start Num: 5

Candidate Starts for Tatanka\_80:

(Start: 5 @52808 has 1 MA's), (8, 52871), (9, 52874), (10, 52904), (12, 52916), (13, 52943), (14, 52961), (15, 52973), (16, 52982), (18, 53039), (19, 53042),

Gene: Tribby\_45 Start: 30555, Stop: 30875, Start Num: 4

Candidate Starts for Tribby\_45:

(1, 30534), (2, 30537), (3, 30543), (Start: 4 @30555 has 14 MA's), (Start: 6 @30603 has 5 MA's), (7, 30606), (11, 30702), (15, 30762), (17, 30828),

Gene: Xenomorph\_41 Start: 30314, Stop: 30586, Start Num: 6

Candidate Starts for Xenomorph\_41:

(2, 30248), (3, 30254), (Start: 4 @30266 has 14 MA's), (Start: 6 @30314 has 5 MA's), (7, 30317), (15, 30473), (20, 30560),