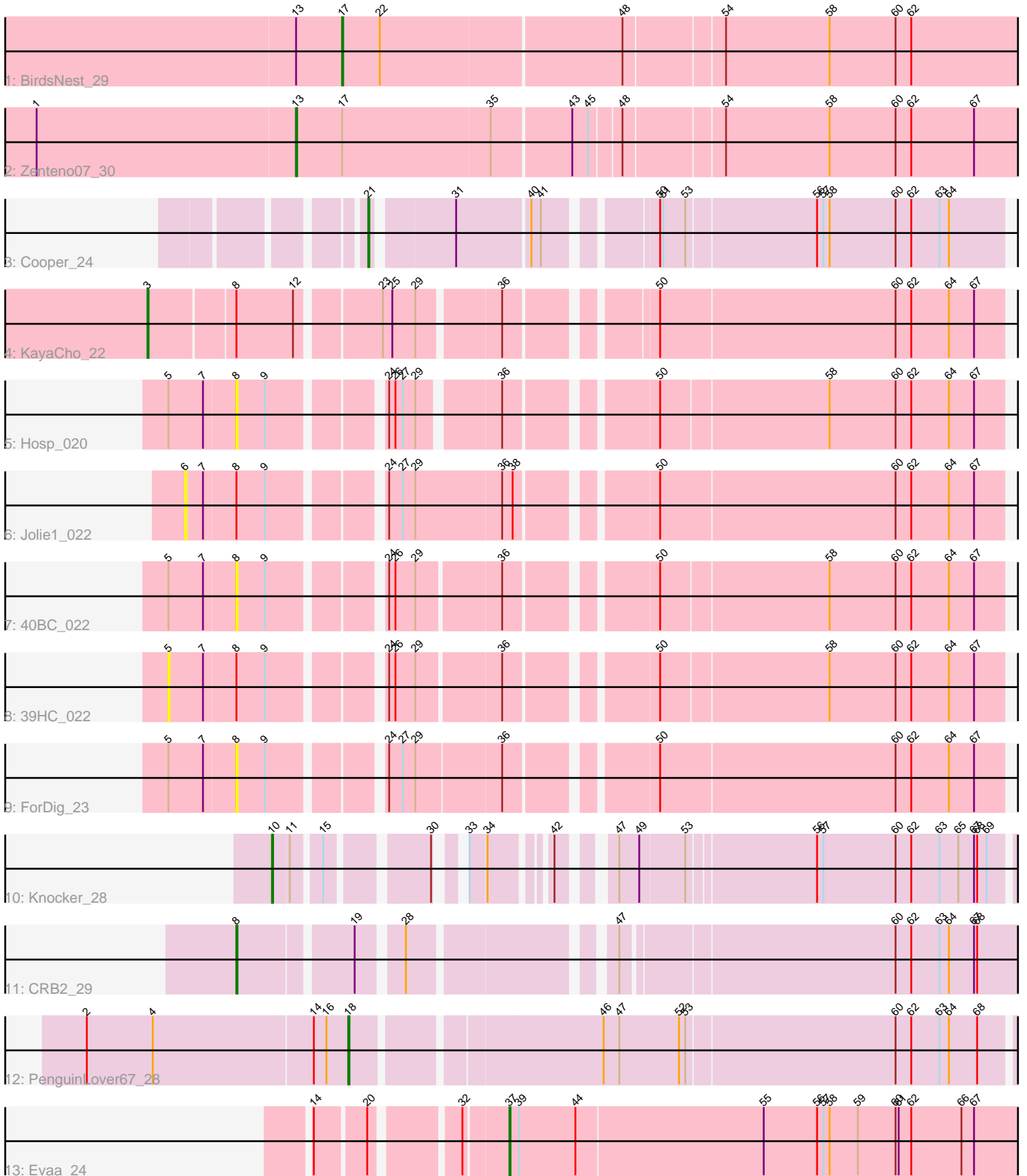# Pham 200787

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 200787 Report

This analysis was run 01/18/25 on database version 583.

Pham number 200787 has 13 members, 5 are drafts.

Phages represented in each track:
• Track 1 : BirdsNest_29
• Track 2 : Zenteno07_30
• Track 3 : Cooper_24
• Track 4 : KayaCho_22
• Track 5 : Hosp_020
• Track 6 : Jolie1_022
• Track 7 : 40BC_022
• Track 8 : 39HC_022
• Track 9 : ForDig_23
• Track 10 : Knocker_28
• Track 11 : CRB2_29
• Track 12 : PenguinLover67_28
• Track 13 : Evaa_24


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

The start number called the most often in the published annotations is 8, it was called in 1 of the 8 non-draft genes in the pham.

Genes that call this "Most Annotated" start:
• 40BC_022, CRB2_29, ForDig_23, Hosp_020,

Genes that have the "Most Annotated" start but do not call it:
• 39HC_022, Jolie1_022, KayaCho_22,

Genes that do not have the "Most Annotated" start:
• BirdsNest_29, Cooper_24, Evaa_24, Knocker_28, PenguinLover67_28, Zenteno07_30,

**Summary by start number:**

Start 3:
• Found in 1 of 13 ( 7.7% ) of genes in pham
• Manual Annotations of this start: 1 of 8

• Called 100.0% of time when present
• Phage (with cluster) where this start called: KayaCho_22 (B6),

Start 5:
• Found in 4 of 13 ( 30.8% ) of genes in pham
• No Manual Annotations of this start.
• Called 25.0% of time when present
• Phage (with cluster) where this start called: 39HC_022 (B6),

Start 6:
• Found in 1 of 13 ( 7.7% ) of genes in pham
• No Manual Annotations of this start.
• Called 100.0% of time when present
• Phage (with cluster) where this start called: Jolie1_022 (B6),

Start 8:
• Found in 7 of 13 ( 53.8% ) of genes in pham
• Manual Annotations of this start: 1 of 8
• Called 57.1% of time when present
• Phage (with cluster) where this start called: 40BC_022 (B6), CRB2_29 (B9),
ForDig_23 (B6), Hosp_020 (B6),

Start 10:
• Found in 1 of 13 ( 7.7% ) of genes in pham
• Manual Annotations of this start: 1 of 8
• Called 100.0% of time when present
• Phage (with cluster) where this start called: Knocker_28 (B9),

Start 13:
• Found in 2 of 13 ( 15.4% ) of genes in pham
• Manual Annotations of this start: 1 of 8
• Called 50.0% of time when present
• Phage (with cluster) where this start called: Zenteno07_30 (B13),

Start 17:
• Found in 2 of 13 ( 15.4% ) of genes in pham
• Manual Annotations of this start: 1 of 8
• Called 50.0% of time when present
• Phage (with cluster) where this start called: BirdsNest_29 (B13),

Start 18:
• Found in 1 of 13 ( 7.7% ) of genes in pham
• Manual Annotations of this start: 1 of 8
• Called 100.0% of time when present
• Phage (with cluster) where this start called: PenguinLover67_28 (B9),

Start 21:
• Found in 1 of 13 ( 7.7% ) of genes in pham
• Manual Annotations of this start: 1 of 8
• Called 100.0% of time when present
• Phage (with cluster) where this start called: Cooper_24 (B4),

Start 37:

• Found in 1 of 13 ( 7.7% ) of genes in pham
• Manual Annotations of this start: 1 of 8
• Called 100.0% of time when present
• Phage (with cluster) where this start called: Evaa_24 (DR),

**Summary by clusters:**

There are 5 clusters represented in this pham: B4, B6, DR, B13, B9,

Info for manual annotations of cluster B13:
•Start number 13 was manually annotated 1 time for cluster B13.
•Start number 17 was manually annotated 1 time for cluster B13.

Info for manual annotations of cluster B4:
•Start number 21 was manually annotated 1 time for cluster B4.

Info for manual annotations of cluster B6:
•Start number 3 was manually annotated 1 time for cluster B6.

Info for manual annotations of cluster B9:
•Start number 8 was manually annotated 1 time for cluster B9.
•Start number 10 was manually annotated 1 time for cluster B9.
•Start number 18 was manually annotated 1 time for cluster B9.

Info for manual annotations of cluster DR:
•Start number 37 was manually annotated 1 time for cluster DR.

*Gene Information:*

Gene: 39HC_022 Start: 18307, Stop: 19038, Start Num: 5
Candidate Starts for 39HC_022:
(5, 18307), (7, 18340), (Start: 8 @18370 has 1 MA's), (9, 18397), (24, 18490), (26, 18496), (29, 18514),
(36, 18589), (50, 18709), (58, 18865), (60, 18928), (62, 18943), (64, 18979), (67, 19003),

Gene: 40BC_022 Start: 18370, Stop: 19038, Start Num: 8
Candidate Starts for 40BC_022:
(5, 18307), (7, 18340), (Start: 8 @18370 has 1 MA's), (9, 18397), (24, 18490), (26, 18496), (29, 18514),
(36, 18589), (50, 18709), (58, 18865), (60, 18928), (62, 18943), (64, 18979), (67, 19003),

Gene: BirdsNest_29 Start: 19215, Stop: 19856, Start Num: 17
Candidate Starts for BirdsNest_29:
(Start: 13 @19173 has 1 MA's), (Start: 17 @19215 has 1 MA's), (22, 19251), (48, 19473), (54, 19563),
(58, 19662), (60, 19725), (62, 19740),

Gene: CRB2_29 Start: 21997, Stop: 22677, Start Num: 8
Candidate Starts for CRB2_29:
(Start: 8 @21997 has 1 MA's), (19, 22096), (28, 22132), (47, 22300), (60, 22549), (62, 22564), (63,
22591), (64, 22600), (67, 22624), (68, 22627),

Gene: Cooper_24 Start: 18981, Stop: 19541, Start Num: 21
Candidate Starts for Cooper_24:

(Start: 21 @18981 has 1 MA's), (31, 19050), (40, 19116), (41, 19125), (50, 19212), (51, 19215), (53, 19236), (56, 19356), (57, 19362), (58, 19368), (60, 19431), (62, 19446), (63, 19473), (64, 19482),

Gene: Evaa_24 Start: 18931, Stop: 19455, Start Num: 37
Candidate Starts for Evaa_24:
(14, 18775), (20, 18820), (32, 18892), (Start: 37 @18931 has 1 MA's), (39, 18940), (44, 18994), (55, 19171), (56, 19222), (57, 19228), (58, 19234), (59, 19261), (60, 19297), (61, 19300), (62, 19312), (66, 19360), (67, 19372),

Gene: ForDig_23 Start: 18356, Stop: 19030, Start Num: 8
Candidate Starts for ForDig_23:
(5, 18293), (7, 18326), (Start: 8 @18356 has 1 MA's), (9, 18383), (24, 18476), (27, 18488), (29, 18500), (36, 18578), (50, 18698), (60, 18920), (62, 18935), (64, 18971), (67, 18995),

Gene: Hosp_020 Start: 16572, Stop: 17234, Start Num: 8
Candidate Starts for Hosp_020:
(5, 16509), (7, 16542), (Start: 8 @16572 has 1 MA's), (9, 16599), (24, 16692), (26, 16698), (27, 16704), (29, 16716), (36, 16785), (50, 16905), (58, 17061), (60, 17124), (62, 17139), (64, 17175), (67, 17199),

Gene: Jolie1_022 Start: 18308, Stop: 19030, Start Num: 6
Candidate Starts for Jolie1_022:
(6, 18308), (7, 18323), (Start: 8 @18353 has 1 MA's), (9, 18380), (24, 18473), (27, 18485), (29, 18497), (36, 18578), (38, 18587), (50, 18698), (60, 18920), (62, 18935), (64, 18971), (67, 18995),

Gene: KayaCho_22 Start: 18287, Stop: 19042, Start Num: 3
Candidate Starts for KayaCho_22:
(Start: 3 @18287 has 1 MA's), (Start: 8 @18365 has 1 MA's), (12, 18419), (23, 18491), (25, 18500), (29, 18521), (36, 18593), (50, 18710), (60, 18932), (62, 18947), (64, 18983), (67, 19007),

Gene: Knocker_28 Start: 22251, Stop: 22850, Start Num: 10
Candidate Starts for Knocker_28:
(Start: 10 @22251 has 1 MA's), (11, 22266), (15, 22290), (30, 22371), (33, 22383), (34, 22398), (42, 22443), (47, 22479), (49, 22497), (53, 22539), (56, 22656), (57, 22662), (60, 22731), (62, 22746), (63, 22773), (65, 22791), (67, 22806), (68, 22809), (69, 22818),

Gene: PenguinLover67_28 Start: 21391, Stop: 22002, Start Num: 18
Candidate Starts for PenguinLover67_28:
(2, 21145), (4, 21208), (14, 21358), (16, 21370), (Start: 18 @21391 has 1 MA's), (46, 21610), (47, 21625), (52, 21682), (53, 21688), (60, 21883), (62, 21898), (63, 21925), (64, 21934), (68, 21961),

Gene: Zenteno07_30 Start: 19548, Stop: 20225, Start Num: 13
Candidate Starts for Zenteno07_30:
(1, 19302), (Start: 13 @19548 has 1 MA's), (Start: 17 @19590 has 1 MA's), (35, 19728), (43, 19800), (45, 19815), (48, 19842), (54, 19932), (58, 20031), (60, 20094), (62, 20109), (67, 20169),