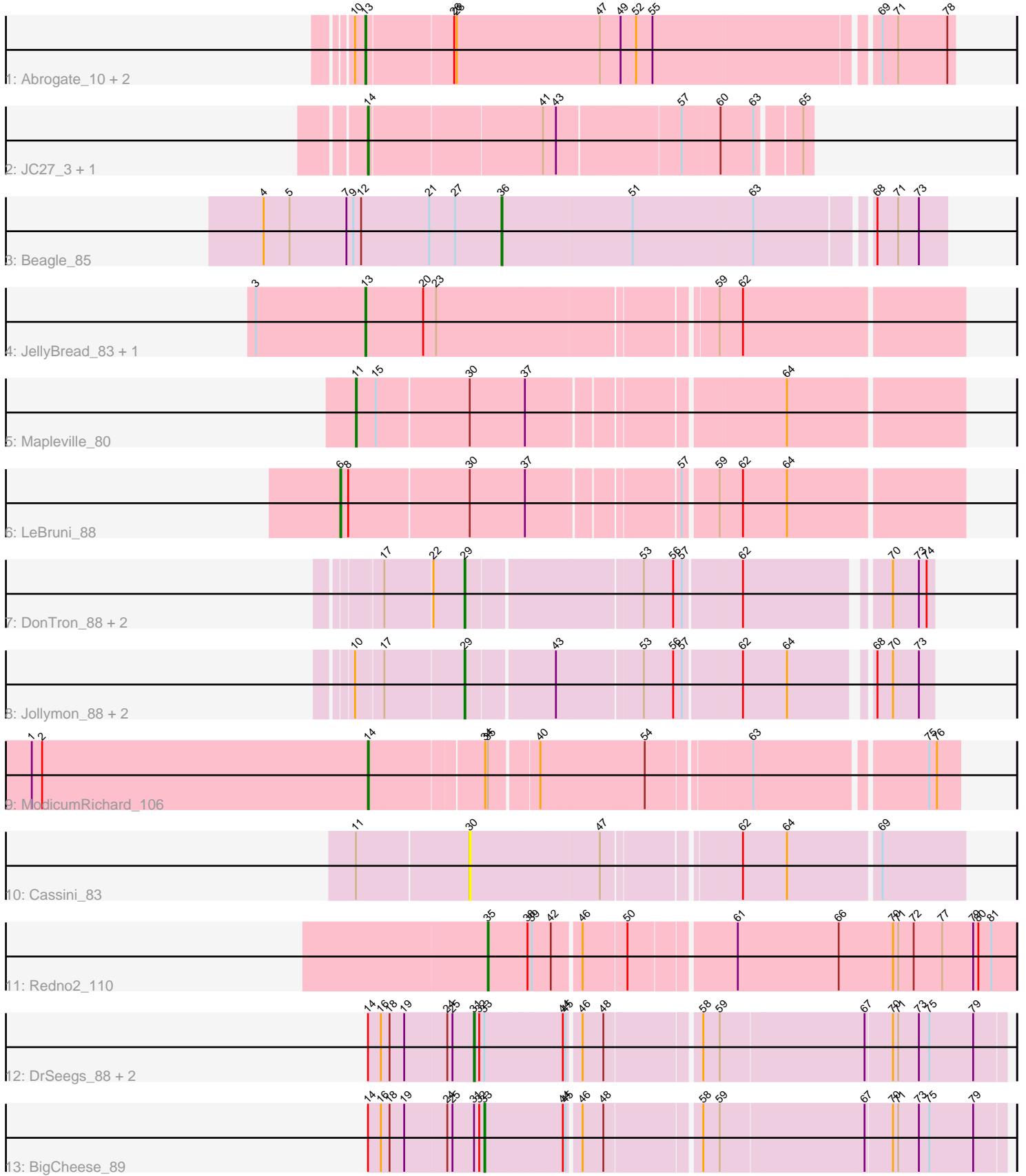


# Pham 305291



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 305291 Report

This analysis was run 06/08/26 on database version 649.

Pham number 305291 has 23 members, 3 are drafts.

Phages represented in each track:

- Track 1 : Abrogate\_10, DreamCatcher\_1, Ruotula\_1
- Track 2 : JC27\_3, Peterson\_2
- Track 3 : Beagle\_85
- Track 4 : JellyBread\_83, BlackSpider\_75
- Track 5 : Mapleville\_80
- Track 6 : LeBruni\_88
- Track 7 : DonTron\_88, Soos\_84, Sting\_87
- Track 8 : Jollymon\_88, Amo99\_91, ColdSoup\_91
- Track 9 : ModicumRichard\_106
- Track 10 : Cassini\_83
- Track 11 : Redno2\_110
- Track 12 : DrSeegs\_88, Miley16\_89, Breezona\_89
- Track 13 : BigCheese\_89

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

The start number called the most often in the published annotations is 13, it was called in 5 of the 20 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

- Abrogate\_10, BlackSpider\_75, DreamCatcher\_1, JellyBread\_83, Ruotula\_1,

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

- 

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

- Amo99\_91, Beagle\_85, BigCheese\_89, Breezona\_89, Cassini\_83, ColdSoup\_91, DonTron\_88, DrSeegs\_88, JC27\_3, Jollymon\_88, LeBruni\_88, Mapleville\_80, Miley16\_89, ModicumRichard\_106, Peterson\_2, Redno2\_110, Soos\_84, Sting\_87,

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

Start 6:

- Found in 1 of 23 ( 4.3% ) 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: LeBruni\_88 (AY),

Start 11:

- Found in 2 of 23 ( 8.7% ) of genes in pham
- Manual Annotations of this start: 1 of 20
- Called 50.0% of time when present
- Phage (with cluster) where this start called: Mapleville\_80 (AY),

Start 13:

- Found in 5 of 23 ( 21.7% ) of genes in pham
- Manual Annotations of this start: 5 of 20
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Abrogate\_10 (A1), BlackSpider\_75 (FN), DreamCatcher\_1 (A1), JellyBread\_83 (AY), Ruotula\_1 (A1),

Start 14:

- Found in 7 of 23 ( 30.4% ) of genes in pham
- Manual Annotations of this start: 3 of 20
- Called 42.9% of time when present
- Phage (with cluster) where this start called: JC27\_3 (A1), ModicumRichard\_106 (DZ), Peterson\_2 (A1),

Start 29:

- Found in 6 of 23 ( 26.1% ) of genes in pham
- Manual Annotations of this start: 4 of 20
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Amo99\_91 (CP), ColdSoup\_91 (CP), DonTron\_88 (CP), Jollymon\_88 (CP), Soos\_84 (CP), Sting\_87 (CP),

Start 30:

- Found in 3 of 23 ( 13.0% ) of genes in pham
- No Manual Annotations of this start.
- Called 33.3% of time when present
- Phage (with cluster) where this start called: Cassini\_83 (FN),

Start 31:

- Found in 4 of 23 ( 17.4% ) of genes in pham
- Manual Annotations of this start: 3 of 20
- Called 75.0% of time when present
- Phage (with cluster) where this start called: Breezona\_89 (L2), DrSeegs\_88 (L2), Miley16\_89 (L2),

Start 33:

- Found in 4 of 23 ( 17.4% ) of genes in pham
- Manual Annotations of this start: 1 of 20
- Called 25.0% of time when present
- Phage (with cluster) where this start called: BigCheese\_89 (L2),

Start 35:

- Found in 2 of 23 ( 8.7% ) of genes in pham
- Manual Annotations of this start: 1 of 20

- Called 50.0% of time when present
- Phage (with cluster) where this start called: Redno2\_110 (J),

Start 36:

- Found in 1 of 23 ( 4.3% ) 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: Beagle\_85 (AP2),

### **Summary by clusters:**

There are 8 clusters represented in this pham: AP2, J, A1, L2, AY, DZ, CP, FN,

Info for manual annotations of cluster A1:

- Start number 13 was manually annotated 3 times for cluster A1.
- Start number 14 was manually annotated 2 times for cluster A1.

Info for manual annotations of cluster AP2:

- Start number 36 was manually annotated 1 time for cluster AP2.

Info for manual annotations of cluster AY:

- Start number 6 was manually annotated 1 time for cluster AY.
- Start number 11 was manually annotated 1 time for cluster AY.
- Start number 13 was manually annotated 1 time for cluster AY.

Info for manual annotations of cluster CP:

- Start number 29 was manually annotated 4 times for cluster CP.

Info for manual annotations of cluster DZ:

- Start number 14 was manually annotated 1 time for cluster DZ.

Info for manual annotations of cluster FN:

- Start number 13 was manually annotated 1 time for cluster FN.

Info for manual annotations of cluster J:

- Start number 35 was manually annotated 1 time for cluster J.

Info for manual annotations of cluster L2:

- Start number 31 was manually annotated 3 times for cluster L2.
- Start number 33 was manually annotated 1 time for cluster L2.

### **Gene Information:**

Gene: Abrogate\_10 Start: 697, Stop: 1347, Start Num: 13

Candidate Starts for Abrogate\_10:

(10, 685), (Start: 13 @697 has 5 MA's), (26, 793), (28, 796), (47, 961), (49, 985), (52, 1003), (55, 1021), (69, 1264), (71, 1282), (78, 1339),

Gene: Amo99\_91 Start: 56649, Stop: 57140, Start Num: 29

Candidate Starts for Amo99\_91:

(10, 56529), (17, 56559), (Start: 29 @56649 has 4 MA's), (43, 56745), (53, 56838), (56, 56871), (57, 56880), (62, 56943), (64, 56994), (68, 57075), (70, 57093), (73, 57123),

Gene: Beagle\_85 Start: 50263, Stop: 49775, Start Num: 36

Candidate Starts for Beagle\_85:

(4, 50536), (5, 50506), (7, 50440), (9, 50434), (12, 50425), (21, 50347), (27, 50317), (Start: 36 @50263 has 1 MA's), (51, 50113), (63, 49978), (68, 49855), (71, 49831), (73, 49807),

Gene: BigCheese\_89 Start: 57485, Stop: 58045, Start Num: 33

Candidate Starts for BigCheese\_89:

(Start: 14 @57356 has 3 MA's), (16, 57371), (18, 57380), (19, 57395), (24, 57443), (25, 57449), (Start: 31 @57473 has 3 MA's), (32, 57479), (Start: 33 @57485 has 1 MA's), (44, 57572), (45, 57575), (46, 57587), (48, 57608), (58, 57707), (59, 57725), (67, 57887), (70, 57917), (71, 57923), (73, 57947), (75, 57959), (79, 58010),

Gene: BlackSpider\_75 Start: 46054, Stop: 46710, Start Num: 13

Candidate Starts for BlackSpider\_75:

(3, 45928), (Start: 13 @46054 has 5 MA's), (20, 46120), (23, 46135), (59, 46438), (62, 46462),

Gene: Breezona\_89 Start: 57473, Stop: 58045, Start Num: 31

Candidate Starts for Breezona\_89:

(Start: 14 @57356 has 3 MA's), (16, 57371), (18, 57380), (19, 57395), (24, 57443), (25, 57449), (Start: 31 @57473 has 3 MA's), (32, 57479), (Start: 33 @57485 has 1 MA's), (44, 57572), (45, 57575), (46, 57587), (48, 57608), (58, 57707), (59, 57725), (67, 57887), (70, 57917), (71, 57923), (73, 57947), (75, 57959), (79, 58010),

Gene: Cassini\_83 Start: 47928, Stop: 48464, Start Num: 30

Candidate Starts for Cassini\_83:

(Start: 11 @47802 has 1 MA's), (30, 47928), (47, 48075), (62, 48216), (64, 48267), (69, 48369),

Gene: ColdSoup\_91 Start: 56730, Stop: 57221, Start Num: 29

Candidate Starts for ColdSoup\_91:

(10, 56610), (17, 56640), (Start: 29 @56730 has 4 MA's), (43, 56826), (53, 56919), (56, 56952), (57, 56961), (62, 57024), (64, 57075), (68, 57156), (70, 57174), (73, 57204),

Gene: DonTron\_88 Start: 56608, Stop: 57099, Start Num: 29

Candidate Starts for DonTron\_88:

(17, 56518), (22, 56572), (Start: 29 @56608 has 4 MA's), (53, 56797), (56, 56830), (57, 56839), (62, 56902), (70, 57052), (73, 57082), (74, 57091),

Gene: DrSeegs\_88 Start: 57473, Stop: 58045, Start Num: 31

Candidate Starts for DrSeegs\_88:

(Start: 14 @57356 has 3 MA's), (16, 57371), (18, 57380), (19, 57395), (24, 57443), (25, 57449), (Start: 31 @57473 has 3 MA's), (32, 57479), (Start: 33 @57485 has 1 MA's), (44, 57572), (45, 57575), (46, 57587), (48, 57608), (58, 57707), (59, 57725), (67, 57887), (70, 57917), (71, 57923), (73, 57947), (75, 57959), (79, 58010),

Gene: DreamCatcher\_1 Start: 695, Stop: 1345, Start Num: 13

Candidate Starts for DreamCatcher\_1:

(10, 683), (Start: 13 @695 has 5 MA's), (26, 791), (28, 794), (47, 959), (49, 983), (52, 1001), (55, 1019), (69, 1262), (71, 1280), (78, 1337),

Gene: JC27\_3 Start: 1139, Stop: 1612, Start Num: 14

Candidate Starts for JC27\_3:

(Start: 14 @1139 has 3 MA's), (41, 1331), (43, 1346), (57, 1481), (60, 1523), (63, 1556), (65, 1601),

Gene: JellyBread\_83 Start: 48413, Stop: 49069, Start Num: 13

Candidate Starts for JellyBread\_83:

(3, 48287), (Start: 13 @48413 has 5 MA's), (20, 48479), (23, 48494), (59, 48797), (62, 48821),

Gene: Jollymon\_88 Start: 56730, Stop: 57221, Start Num: 29

Candidate Starts for Jollymon\_88:

(10, 56610), (17, 56640), (Start: 29 @56730 has 4 MA's), (43, 56826), (53, 56919), (56, 56952), (57, 56961), (62, 57024), (64, 57075), (68, 57156), (70, 57174), (73, 57204),

Gene: LeBruni\_88 Start: 48740, Stop: 49414, Start Num: 6

Candidate Starts for LeBruni\_88:

(Start: 6 @48740 has 1 MA's), (8, 48749), (30, 48884), (37, 48947), (57, 49106), (59, 49142), (62, 49166), (64, 49217),

Gene: Mapleville\_80 Start: 47176, Stop: 47832, Start Num: 11

Candidate Starts for Mapleville\_80:

(Start: 11 @47176 has 1 MA's), (15, 47197), (30, 47302), (37, 47365), (64, 47635),

Gene: Miley16\_89 Start: 57473, Stop: 58045, Start Num: 31

Candidate Starts for Miley16\_89:

(Start: 14 @57356 has 3 MA's), (16, 57371), (18, 57380), (19, 57395), (24, 57443), (25, 57449), (Start: 31 @57473 has 3 MA's), (32, 57479), (Start: 33 @57485 has 1 MA's), (44, 57572), (45, 57575), (46, 57587), (48, 57608), (58, 57707), (59, 57725), (67, 57887), (70, 57917), (71, 57923), (73, 57947), (75, 57959), (79, 58010),

Gene: ModicumRichard\_106 Start: 60143, Stop: 60772, Start Num: 14

Candidate Starts for ModicumRichard\_106:

(1, 59753), (2, 59765), (Start: 14 @60143 has 3 MA's), (34, 60269), (Start: 35 @60272 has 1 MA's), (40, 60323), (54, 60440), (63, 60551), (75, 60737), (76, 60746),

Gene: Peterson\_2 Start: 990, Stop: 1463, Start Num: 14

Candidate Starts for Peterson\_2:

(Start: 14 @990 has 3 MA's), (41, 1182), (43, 1197), (57, 1332), (60, 1374), (63, 1407), (65, 1452),

Gene: Redno2\_110 Start: 62847, Stop: 63428, Start Num: 35

Candidate Starts for Redno2\_110:

(Start: 35 @62847 has 1 MA's), (38, 62892), (39, 62895), (42, 62916), (46, 62946), (50, 62994), (61, 63105), (66, 63222), (70, 63285), (71, 63291), (72, 63309), (77, 63342), (79, 63378), (80, 63384), (81, 63399),

Gene: Ruotula\_1 Start: 698, Stop: 1348, Start Num: 13

Candidate Starts for Ruotula\_1:

(10, 686), (Start: 13 @698 has 5 MA's), (26, 794), (28, 797), (47, 962), (49, 986), (52, 1004), (55, 1022), (69, 1265), (71, 1283), (78, 1340),

Gene: Soos\_84 Start: 55934, Stop: 56425, Start Num: 29

Candidate Starts for Soos\_84:

(17, 55844), (22, 55898), (Start: 29 @55934 has 4 MA's), (53, 56123), (56, 56156), (57, 56165), (62, 56228), (70, 56378), (73, 56408), (74, 56417),

Gene: Sting\_87 Start: 56373, Stop: 56864, Start Num: 29

Candidate Starts for Sting\_87:

(17, 56283), (22, 56337), (Start: 29 @56373 has 4 MA's), (53, 56562), (56, 56595), (57, 56604), (62, 56667), (70, 56817), (73, 56847), (74, 56856),