

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 163923 Report

This analysis was run 05/04/24 on database version 560.

Pham number 163923 has 21 members, 4 are drafts.

Phages represented in each track:

- Track 1 : Deenasa 57
- Track 2 : Eddasa_56
- Track 3: Hydra_56, Esperer_55, Leviticus_55
- Track 4 : Nabi 57
- Track 5 : Zemlya 56
- Track 6 : Jada_47, Forrest_49
- Track 7: Miskis 75
- Track 8 : Posh_67, Wrigley_69
- Track 9 : Bradissa 60
- Track 10 : Cardigan_137
- Track 11 : Axumite_50, CharlottesWeb_49
- Track 12 : Ligma 50
- Track 13 : MakoManhole 50
- Track 14 : DumpsterDude_62
- Track 15 : Stiles 46
- Track 16 : StAB 46

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

The start number called the most often in the published annotations is 15, it was called in 6 of the 17 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

• Eddasa_56, Esperer_55, Hydra_56, Leviticus_55, Nabi_57, Zemlya_56,

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

StAB_46,

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

• Axumite_50, Bradissa_60, Cardigan_137, CharlottesWeb_49, Deenasa_57, DumpsterDude_62, Forrest_49, Jada_47, Ligma_50, MakoManhole_50, Miskis_75, Posh_67, Stiles_46, Wrigley_69,

Summary by start number:

Start 10:

- Found in 4 of 21 (19.0%) of genes in pham
- Manual Annotations of this start: 4 of 17
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Bradissa_60 (CY1), DumpsterDude_62 (DW), Posh_67 (CY), Wrigley_69 (CY),

Start 15:

- Found in 7 of 21 (33.3%) of genes in pham
- Manual Annotations of this start: 6 of 17
- Called 85.7% of time when present
- Phage (with cluster) where this start called: Eddasa_56 (BD1), Esperer_55 (BD1), Hydra_56 (BD1), Leviticus_55 (BD1), Nabi_57 (BD1), Zemlya_56 (BD1),

Start 17:

- Found in 1 of 21 (4.8%) of genes in pham
- No Manual Annotations of this start.
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Cardigan_137 (DD),

Start 18:

- Found in 1 of 21 (4.8%) of genes in pham
- No Manual Annotations of this start.
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Miskis_75 (CQ),

Start 20:

- Found in 2 of 21 (9.5%) of genes in pham
- Manual Annotations of this start: 2 of 17
- Called 100.0% of time when present
- Phage (with cluster) where this start called: StAB 46 (EP), Stiles 46 (EP),

Start 22:

- Found in 4 of 21 (19.0%) of genes in pham
- No Manual Annotations of this start.
- Called 25.0% of time when present
- Phage (with cluster) where this start called: MakoManhole 50 (DR),

Start 24:

- Found in 3 of 21 (14.3%) of genes in pham
- Manual Annotations of this start: 1 of 17
- Called 66.7% of time when present
- Phage (with cluster) where this start called: Axumite_50 (DR), CharlottesWeb_49 (DR),

Start 25:

- Found in 3 of 21 (14.3%) of genes in pham
- Manual Annotations of this start: 3 of 17
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Deenasa_57 (B3), Forrest_49 (BK1),
 Jada_47 (BK1),

Start 28:

- Found in 3 of 21 (14.3%) of genes in pham
- Manual Annotations of this start: 1 of 17
- Called 33.3% of time when present
- Phage (with cluster) where this start called: Ligma_50 (DR),

Summary by clusters:

There are 10 clusters represented in this pham: CY1, DD, CY, BD1, BK1, B3, DW, CQ, DR, EP,

Info for manual annotations of cluster B3:

•Start number 25 was manually annotated 1 time for cluster B3.

Info for manual annotations of cluster BD1:

•Start number 15 was manually annotated 6 times for cluster BD1.

Info for manual annotations of cluster BK1:

•Start number 25 was manually annotated 2 times for cluster BK1.

Info for manual annotations of cluster CY:

•Start number 10 was manually annotated 2 times for cluster CY.

Info for manual annotations of cluster CY1:

•Start number 10 was manually annotated 1 time for cluster CY1.

Info for manual annotations of cluster DR:

- •Start number 24 was manually annotated 1 time for cluster DR.
- •Start number 28 was manually annotated 1 time for cluster DR.

Info for manual annotations of cluster DW:

•Start number 10 was manually annotated 1 time for cluster DW.

Info for manual annotations of cluster EP:

•Start number 20 was manually annotated 2 times for cluster EP.

Gene Information:

Gene: Axumite 50 Start: 44137, Stop: 43628, Start Num: 24

Candidate Starts for Axumite_50:

(22, 44149), (Start: 24 @44137 has 1 MA's), (26, 44101), (Start: 28 @44095 has 1 MA's), (32, 44008), (34, 43990), (42, 43912), (48, 43861), (56, 43786),

Gene: Bradissa_60 Start: 44116, Stop: 44703, Start Num: 10

Candidate Starts for Bradissa 60:

(1, 43708), (3, 43816), (4, 43888), (5, 43924), (6, 44056), (Start: 10 @44116 has 4 MA's), (12, 44131), (13, 44167), (14, 44176), (16, 44191), (23, 44221), (31, 44302), (36, 44410), (48, 44512), (49, 44515), (67, 44671),

Gene: Cardigan_137 Start: 77101, Stop: 77631, Start Num: 17

Candidate Starts for Cardigan_137:

(17, 77101), (21, 77116), (27, 77179), (29, 77188), (37, 77311), (46, 77404), (48, 77413), (52, 77446), (55, 77464), (61, 77530), (62, 77551), (74, 77626),

Gene: CharlottesWeb_49 Start: 43503, Stop: 42994, Start Num: 24

Candidate Starts for CharlottesWeb_49:

(22, 43515), (Start: 24 @43503 has 1 MA's), (26, 43467), (Start: 28 @43461 has 1 MA's), (32, 43374), (34, 43356), (42, 43278), (48, 43227), (56, 43152),

Gene: Deenasa 57 Start: 52719, Stop: 52066, Start Num: 25

Candidate Starts for Deenasa 57:

(19, 52743), (Start: 25 @52719 has 3 MA's), (48, 52446), (64, 52302), (65, 52296), (66, 52287), (68, 52281), (73, 52242), (75, 52119), (76, 52095),

Gene: DumpsterDude_62 Start: 46219, Stop: 46806, Start Num: 10

Candidate Starts for DumpsterDude_62:

(1, 45811), (3, 45919), (4, 45991), (5, 46027), (6, 46159), (Start: 10 @46219 has 4 MA's), (13, 46270), (14, 46279), (16, 46294), (23, 46324), (31, 46405), (36, 46513), (48, 46615), (49, 46618), (58, 46702), (60, 46714), (67, 46774),

Gene: Eddasa_56 Start: 41265, Stop: 40723, Start Num: 15

Candidate Starts for Eddasa_56:

(9, 41334), (Start: 15 @41265 has 6 MA's), (35, 41046), (40, 40995), (45, 40953), (48, 40932), (72, 40743),

Gene: Esperer_55 Start: 40815, Stop: 40285, Start Num: 15

Candidate Starts for Esperer 55:

(Start: 15 @40815 has 6 MA's), (30, 40707), (43, 40539), (50, 40488), (53, 40458), (71, 40311), (72, 40305),

Gene: Forrest_49 Start: 41931, Stop: 42446, Start Num: 25

Candidate Starts for Forrest 49:

(Start: 25 @41931 has 3 MA's), (47, 42195), (48, 42201), (54, 42249), (55, 42252), (63, 42342),

Gene: Hydra_56 Start: 41651, Stop: 41121, Start Num: 15

Candidate Starts for Hydra_56:

(Start: 15 @41651 has 6 MA's), (30, 41543), (43, 41375), (50, 41324), (53, 41294), (71, 41147), (72, 41141),

Gene: Jada 47 Start: 41113, Stop: 41628, Start Num: 25

Candidate Starts for Jada_47:

(Start: 25 @41113 has 3 MA's), (47, 41377), (48, 41383), (54, 41431), (55, 41434), (63, 41524),

Gene: Leviticus 55 Start: 41002, Stop: 40472, Start Num: 15

Candidate Starts for Leviticus 55:

(Start: 15 @41002 has 6 MA's), (30, 40894), (43, 40726), (50, 40675), (53, 40645), (71, 40498), (72, 40492),

Gene: Ligma 50 Start: 44095, Stop: 43628, Start Num: 28

Candidate Starts for Ligma_50:

(22, 44149), (Start: 24 @44137 has 1 MA's), (26, 44101), (Start: 28 @44095 has 1 MA's), (32, 44008), (34, 43990), (42, 43912), (48, 43861), (56, 43786),

Gene: MakoManhole_50 Start: 45251, Stop: 44724, Start Num: 22

Candidate Starts for MakoManhole 50:

(22, 45251), (32, 45113), (34, 45095), (39, 45050), (51, 44948), (56, 44894), (57, 44885), (67, 44807),

Gene: Miskis_75 Start: 47774, Stop: 48271, Start Num: 18

Candidate Starts for Miskis_75:

(7, 47657), (18, 47774), (38, 47984), (44, 48038), (48, 48068), (52, 48095), (59, 48146), (69, 48215),

Gene: Nabi_57 Start: 42255, Stop: 41725, Start Num: 15

Candidate Starts for Nabi 57:

(8, 42360), (11, 42315), (Start: 15 @ 42255 has 6 MA's), (30, 42147), (33, 42084), (41, 42000), (43, 41979), (49, 41940), (50, 41928), (53, 41898), (71, 41751), (72, 41745),

Gene: Posh_67 Start: 45892, Stop: 46479, Start Num: 10

Candidate Starts for Posh_67:

(5, 45700), (6, 45832), (Start: 10 @45892 has 4 MA's), (14, 45952), (16, 45967), (23, 45997), (31, 46078), (36, 46186), (48, 46288), (49, 46291), (67, 46447),

Gene: StAB_46 Start: 35820, Stop: 36344, Start Num: 20

Candidate Starts for StAB 46:

(2, 35346), (Start: 15 @35793 has 6 MA's), (Start: 20 @35820 has 2 MA's), (56, 36168), (70, 36270), (73, 36297),

Gene: Stiles_46 Start: 35275, Stop: 35799, Start Num: 20

Candidate Starts for Stiles_46:

(2, 34801), (Start: 20 @35275 has 2 MA's), (56, 35623), (70, 35725),

Gene: Wrigley_69 Start: 45475, Stop: 46062, Start Num: 10

Candidate Starts for Wrigley_69:

(5, 45283), (6, 45415), (Start: 10 @45475 has 4 MA's), (14, 45535), (16, 45550), (23, 45580), (31, 45661), (36, 45769), (48, 45871), (49, 45874), (67, 46030),

Gene: Zemlya 56 Start: 42043, Stop: 41525, Start Num: 15

Candidate Starts for Zemlya_56:

(Start: 15 @ 42043 has 6 MA's), (37, 41836), (41, 41794), (46, 41746),