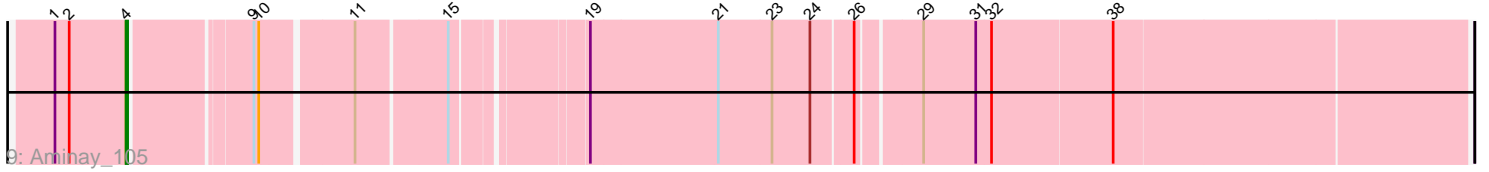
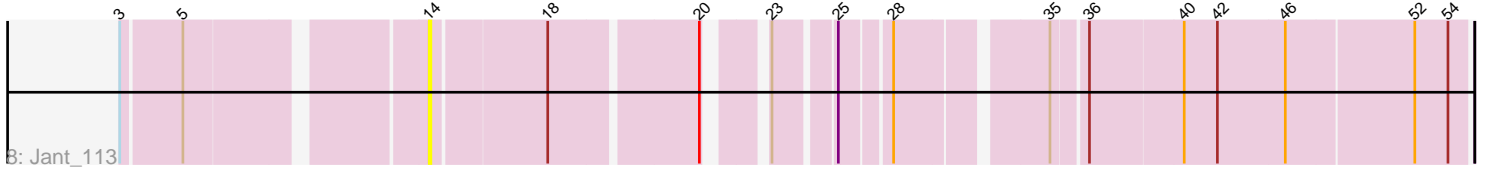
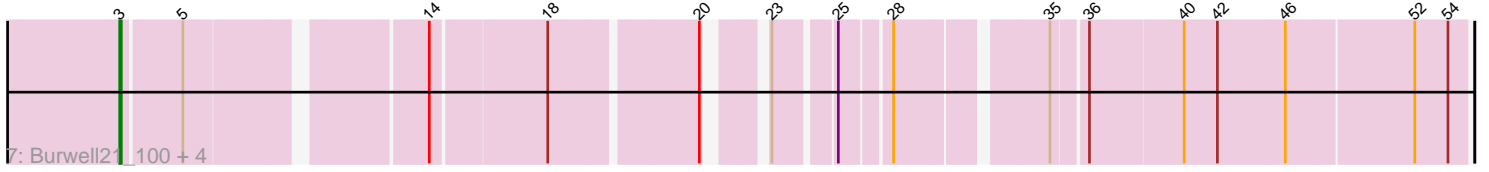
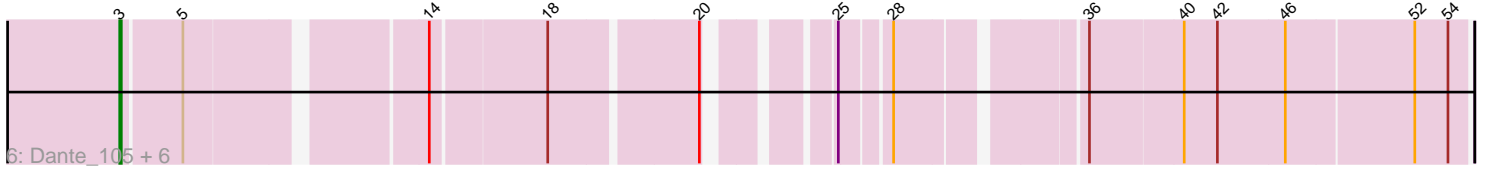
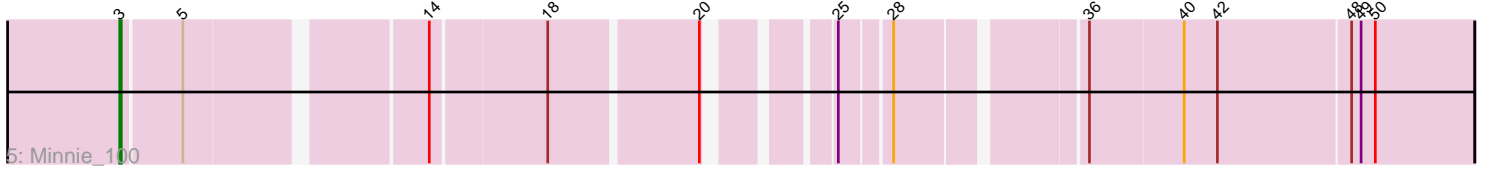
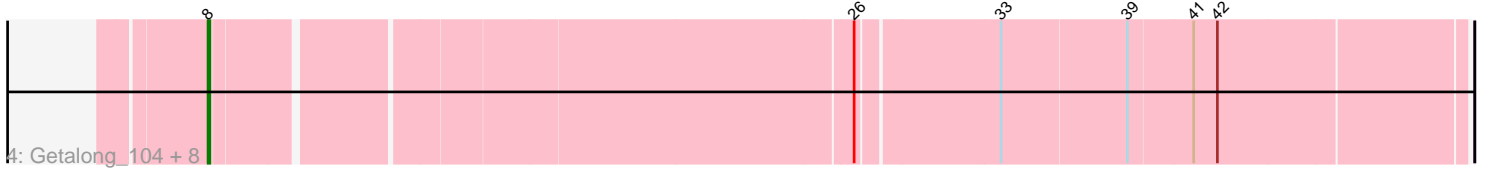
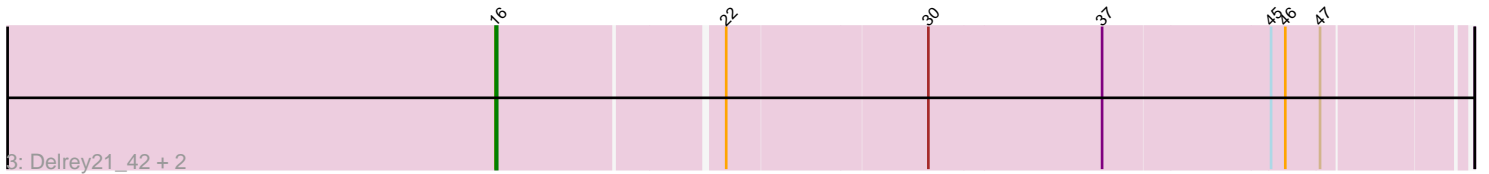
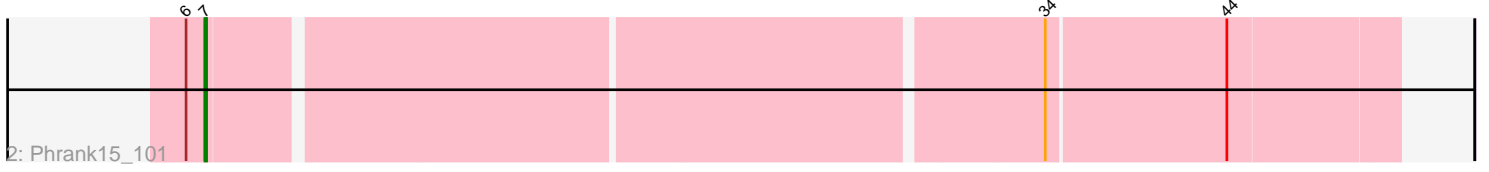
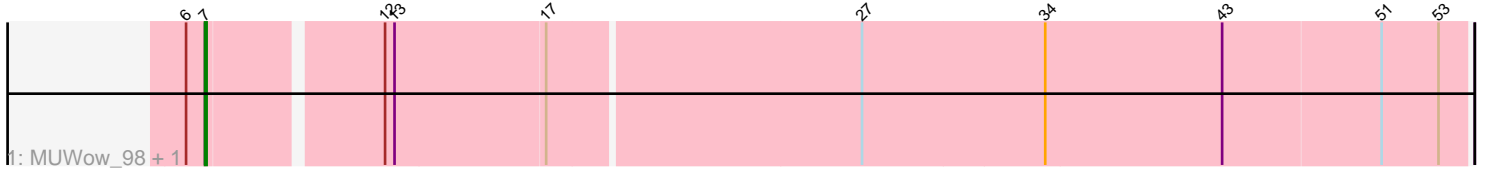


Pham 221661



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 221661 Report

This analysis was run 03/28/25 on database version 593.

Pham number 221661 has 30 members, 4 are drafts.

Phages represented in each track:

- Track 1 : MUWow_98, Anekin_96
- Track 2 : Phrank15_101
- Track 3 : Delrey21_42, Verity_42, DoctorFroggo_42
- Track 4 : Getalong_104, LitninMcQueen_111, Asapag_99, Horus_104, Frickyeah_108, Budski_107, BENtherdunthat_102, ShawBrad_111, Leroy_104
- Track 5 : Minnie_100
- Track 6 : Dante_105, WillSterrel_104, Sandalphon_104, Royals2015_109, IrishSherpFalk_106, Juniper1_99, Mahavrat_99
- Track 7 : Burwell21_100, Llij_100, Phanphagia_110, Shauna1_107, Whatsapiecost_100
- Track 8 : Jant_113
- Track 9 : Aminay_105

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

The start number called the most often in the published annotations is 3, it was called in 13 of the 26 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

- Burwell21_100, Dante_105, IrishSherpFalk_106, Juniper1_99, Llij_100, Mahavrat_99, Minnie_100, Phanphagia_110, Royals2015_109, Sandalphon_104, Shauna1_107, Whatsapiecost_100, WillSterrel_104,

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

- Jant_113,

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

- Aminay_105, Anekin_96, Asapag_99, BENtherdunthat_102, Budski_107, Delrey21_42, DoctorFroggo_42, Frickyeah_108, Getalong_104, Horus_104, Leroy_104, LitninMcQueen_111, MUWow_98, Phrank15_101, ShawBrad_111, Verity_42,

Summary by start number:

Start 3:

- Found in 14 of 30 (46.7%) of genes in pham
- Manual Annotations of this start: 13 of 26
- Called 92.9% of time when present
- Phage (with cluster) where this start called: Burwell21_100 (F1), Dante_105 (F1), IrishSherpFalk_106 (F1), Juniper1_99 (F1), Llij_100 (F1), Mahavrat_99 (F1), Minnie_100 (F1), Phanphagia_110 (F1), Royals2015_109 (F1), Sandalphon_104 (F1), Shauna1_107 (F1), Whatsapiecost_100 (F1), WillSterrel_104 (F1),

Start 4:

- Found in 1 of 30 (3.3%) of genes in pham
- Manual Annotations of this start: 1 of 26
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Aminay_105 (K7),

Start 7:

- Found in 3 of 30 (10.0%) of genes in pham
- Manual Annotations of this start: 2 of 26
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Anekin_96 (AY), MUWow_98 (AY), Phrank15_101 (AY),

Start 8:

- Found in 9 of 30 (30.0%) of genes in pham
- Manual Annotations of this start: 7 of 26
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Asapag_99 (DN1), BENtherdunthat_102 (DN1), Budski_107 (DN), Frickyeah_108 (DN1), Getalong_104 (DN1), Horus_104 (DN1), Leroy_104 (DN1), LitninMcQueen_111 (DN1), ShawBrad_111 (DN1),

Start 14:

- Found in 14 of 30 (46.7%) of genes in pham
- No Manual Annotations of this start.
- Called 7.1% of time when present
- Phage (with cluster) where this start called: Jant_113 (F1),

Start 16:

- Found in 3 of 30 (10.0%) of genes in pham
- Manual Annotations of this start: 3 of 26
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Delrey21_42 (DE4), DoctorFroggo_42 (DE4), Verity_42 (DE4),

Summary by clusters:

There are 6 clusters represented in this pham: DN, F1, DE4, DN1, AY, K7,

Info for manual annotations of cluster AY:

- Start number 7 was manually annotated 2 times for cluster AY.

Info for manual annotations of cluster DE4:

- Start number 16 was manually annotated 3 times for cluster DE4.

Info for manual annotations of cluster DN:

- Start number 8 was manually annotated 1 time for cluster DN.

Info for manual annotations of cluster DN1:

- Start number 8 was manually annotated 6 times for cluster DN1.

Info for manual annotations of cluster F1:

- Start number 3 was manually annotated 13 times for cluster F1.

Info for manual annotations of cluster K7:

- Start number 4 was manually annotated 1 time for cluster K7.

Gene Information:

Gene: Aminay_105 Start: 59595, Stop: 60371, Start Num: 4

Candidate Starts for Aminay_105:

(1, 59550), (2, 59559), (Start: 4 @59595 has 1 MA's), (9, 59664), (10, 59667), (11, 59718), (15, 59772), (19, 59844), (21, 59922), (23, 59955), (24, 59979), (26, 60003), (29, 60039), (31, 60072), (32, 60081), (38, 60156),

Gene: Anekin_96 Start: 52648, Stop: 53418, Start Num: 7

Candidate Starts for Anekin_96:

(6, 52636), (Start: 7 @52648 has 2 MA's), (12, 52750), (13, 52756), (17, 52849), (27, 53041), (34, 53155), (43, 53266), (51, 53365), (53, 53401),

Gene: Asapag_99 Start: 54319, Stop: 55062, Start Num: 8

Candidate Starts for Asapag_99:

(Start: 8 @54319 has 7 MA's), (26, 54697), (33, 54781), (39, 54859), (41, 54898), (42, 54913),

Gene: BENtherdunthat_102 Start: 54067, Stop: 54810, Start Num: 8

Candidate Starts for BENtherdunthat_102:

(Start: 8 @54067 has 7 MA's), (26, 54445), (33, 54529), (39, 54607), (41, 54646), (42, 54661),

Gene: Budski_107 Start: 55759, Stop: 56502, Start Num: 8

Candidate Starts for Budski_107:

(Start: 8 @55759 has 7 MA's), (26, 56137), (33, 56221), (39, 56299), (41, 56338), (42, 56353),

Gene: Burwell21_100 Start: 57289, Stop: 58032, Start Num: 3

Candidate Starts for Burwell21_100:

(Start: 3 @57289 has 13 MA's), (5, 57325), (14, 57460), (18, 57529), (20, 57616), (23, 57640), (25, 57673), (28, 57700), (35, 57784), (36, 57802), (40, 57859), (42, 57880), (46, 57922), (52, 58000), (54, 58021),

Gene: Dante_105 Start: 58836, Stop: 59579, Start Num: 3

Candidate Starts for Dante_105:

(Start: 3 @58836 has 13 MA's), (5, 58872), (14, 59007), (18, 59076), (20, 59163), (25, 59220), (28, 59247), (36, 59349), (40, 59406), (42, 59427), (46, 59469), (52, 59547), (54, 59568),

Gene: Delrey21_42 Start: 39489, Stop: 40070, Start Num: 16

Candidate Starts for Delrey21_42:

(Start: 16 @39489 has 3 MA's), (22, 39624), (30, 39747), (37, 39855), (45, 39957), (46, 39966), (47, 39987),

Gene: DoctorFroggo_42 Start: 39489, Stop: 40070, Start Num: 16

Candidate Starts for DoctorFroggo_42:

(Start: 16 @39489 has 3 MA's), (22, 39624), (30, 39747), (37, 39855), (45, 39957), (46, 39966), (47, 39987),

Gene: Frickyeah_108 Start: 54593, Stop: 55336, Start Num: 8

Candidate Starts for Frickyeah_108:

(Start: 8 @54593 has 7 MA's), (26, 54971), (33, 55055), (39, 55133), (41, 55172), (42, 55187),

Gene: Getalong_104 Start: 55414, Stop: 56157, Start Num: 8

Candidate Starts for Getalong_104:

(Start: 8 @55414 has 7 MA's), (26, 55792), (33, 55876), (39, 55954), (41, 55993), (42, 56008),

Gene: Horus_104 Start: 54868, Stop: 55611, Start Num: 8

Candidate Starts for Horus_104:

(Start: 8 @54868 has 7 MA's), (26, 55246), (33, 55330), (39, 55408), (41, 55447), (42, 55462),

Gene: IrishSherpFalk_106 Start: 57759, Stop: 58502, Start Num: 3

Candidate Starts for IrishSherpFalk_106:

(Start: 3 @57759 has 13 MA's), (5, 57795), (14, 57930), (18, 57999), (20, 58086), (25, 58143), (28, 58170), (36, 58272), (40, 58329), (42, 58350), (46, 58392), (52, 58470), (54, 58491),

Gene: Jant_113 Start: 57191, Stop: 57763, Start Num: 14

Candidate Starts for Jant_113:

(Start: 3 @57020 has 13 MA's), (5, 57056), (14, 57191), (18, 57260), (20, 57347), (23, 57371), (25, 57404), (28, 57431), (35, 57515), (36, 57533), (40, 57590), (42, 57611), (46, 57653), (52, 57731), (54, 57752),

Gene: Juniper1_99 Start: 56460, Stop: 57203, Start Num: 3

Candidate Starts for Juniper1_99:

(Start: 3 @56460 has 13 MA's), (5, 56496), (14, 56631), (18, 56700), (20, 56787), (25, 56844), (28, 56871), (36, 56973), (40, 57030), (42, 57051), (46, 57093), (52, 57171), (54, 57192),

Gene: Leroy_104 Start: 53063, Stop: 53806, Start Num: 8

Candidate Starts for Leroy_104:

(Start: 8 @53063 has 7 MA's), (26, 53441), (33, 53525), (39, 53603), (41, 53642), (42, 53657),

Gene: LitninMcQueen_111 Start: 56492, Stop: 57235, Start Num: 8

Candidate Starts for LitninMcQueen_111:

(Start: 8 @56492 has 7 MA's), (26, 56870), (33, 56954), (39, 57032), (41, 57071), (42, 57086),

Gene: Llij_100 Start: 56053, Stop: 56796, Start Num: 3

Candidate Starts for Llij_100:

(Start: 3 @56053 has 13 MA's), (5, 56089), (14, 56224), (18, 56293), (20, 56380), (23, 56404), (25, 56437), (28, 56464), (35, 56548), (36, 56566), (40, 56623), (42, 56644), (46, 56686), (52, 56764), (54, 56785),

Gene: MUWow_98 Start: 54213, Stop: 54983, Start Num: 7

Candidate Starts for MUWow_98:

(6, 54201), (Start: 7 @54213 has 2 MA's), (12, 54315), (13, 54321), (17, 54414), (27, 54606), (34, 54720), (43, 54831), (51, 54930), (53, 54966),

Gene: Mahavrat_99 Start: 55132, Stop: 55875, Start Num: 3

Candidate Starts for Mahavrat_99:

(Start: 3 @55132 has 13 MA's), (5, 55168), (14, 55303), (18, 55372), (20, 55459), (25, 55516), (28, 55543), (36, 55645), (40, 55702), (42, 55723), (46, 55765), (52, 55843), (54, 55864),

Gene: Minnie_100 Start: 58451, Stop: 59200, Start Num: 3

Candidate Starts for Minnie_100:

(Start: 3 @58451 has 13 MA's), (5, 58487), (14, 58622), (18, 58691), (20, 58778), (25, 58835), (28, 58862), (36, 58964), (40, 59021), (42, 59042), (48, 59123), (49, 59129), (50, 59138),

Gene: Phanphagia_110 Start: 58890, Stop: 59633, Start Num: 3

Candidate Starts for Phanphagia_110:

(Start: 3 @58890 has 13 MA's), (5, 58926), (14, 59061), (18, 59130), (20, 59217), (23, 59241), (25, 59274), (28, 59301), (35, 59385), (36, 59403), (40, 59460), (42, 59481), (46, 59523), (52, 59601), (54, 59622),

Gene: Phrank15_101 Start: 52549, Stop: 53265, Start Num: 7

Candidate Starts for Phrank15_101:

(6, 52537), (Start: 7 @52549 has 2 MA's), (34, 53050), (44, 53161),

Gene: Royals2015_109 Start: 56541, Stop: 57284, Start Num: 3

Candidate Starts for Royals2015_109:

(Start: 3 @56541 has 13 MA's), (5, 56577), (14, 56712), (18, 56781), (20, 56868), (25, 56925), (28, 56952), (36, 57054), (40, 57111), (42, 57132), (46, 57174), (52, 57252), (54, 57273),

Gene: Sandalphon_104 Start: 58724, Stop: 59467, Start Num: 3

Candidate Starts for Sandalphon_104:

(Start: 3 @58724 has 13 MA's), (5, 58760), (14, 58895), (18, 58964), (20, 59051), (25, 59108), (28, 59135), (36, 59237), (40, 59294), (42, 59315), (46, 59357), (52, 59435), (54, 59456),

Gene: Shauna1_107 Start: 58506, Stop: 59249, Start Num: 3

Candidate Starts for Shauna1_107:

(Start: 3 @58506 has 13 MA's), (5, 58542), (14, 58677), (18, 58746), (20, 58833), (23, 58857), (25, 58890), (28, 58917), (35, 59001), (36, 59019), (40, 59076), (42, 59097), (46, 59139), (52, 59217), (54, 59238),

Gene: ShawBrad_111 Start: 55126, Stop: 55869, Start Num: 8

Candidate Starts for ShawBrad_111:

(Start: 8 @55126 has 7 MA's), (26, 55504), (33, 55588), (39, 55666), (41, 55705), (42, 55720),

Gene: Verity_42 Start: 39489, Stop: 40070, Start Num: 16

Candidate Starts for Verity_42:

(Start: 16 @39489 has 3 MA's), (22, 39624), (30, 39747), (37, 39855), (45, 39957), (46, 39966), (47, 39987),

Gene: Whatsapiecost_100 Start: 52789, Stop: 53532, Start Num: 3

Candidate Starts for Whatsapiecost_100:

(Start: 3 @52789 has 13 MA's), (5, 52825), (14, 52960), (18, 53029), (20, 53116), (23, 53140), (25, 53173), (28, 53200), (35, 53284), (36, 53302), (40, 53359), (42, 53380), (46, 53422), (52, 53500), (54, 53521),

Gene: WillSterrel_104 Start: 57792, Stop: 58535, Start Num: 3

Candidate Starts for WillSterrel_104:

(Start: 3 @57792 has 13 MA's), (5, 57828), (14, 57963), (18, 58032), (20, 58119), (25, 58176), (28, 58203), (36, 58305), (40, 58362), (42, 58383), (46, 58425), (52, 58503), (54, 58524),