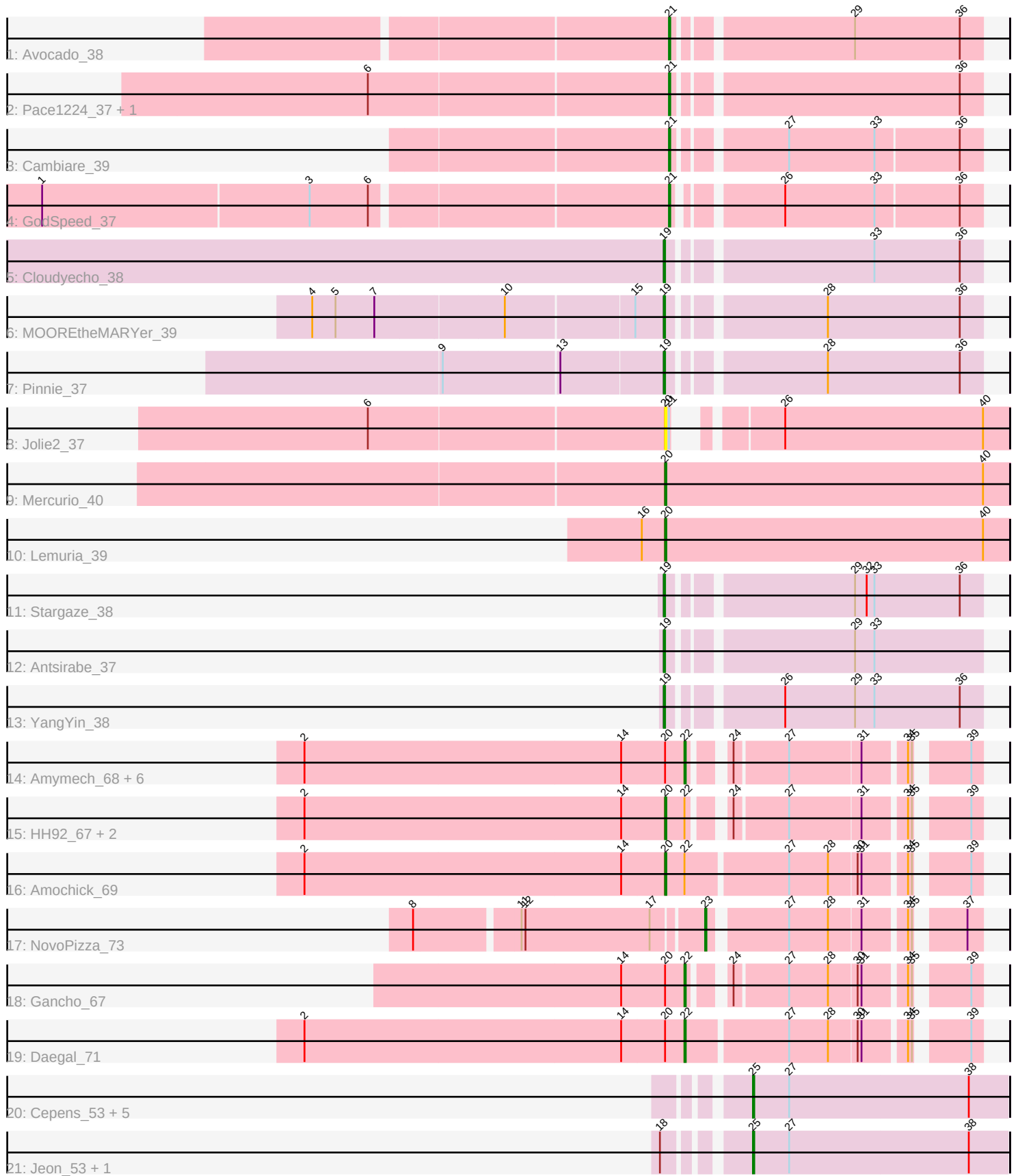


Pham 331049



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 331049 Report

This analysis was run 09/05/26 on database version 662.

Pham number 331049 has 36 members, 2 are drafts.

Phages represented in each track:

- Track 1 : Avocado_38
- Track 2 : Pace1224_37, FlagStaff_37
- Track 3 : Cambiare_39
- Track 4 : GodSpeed_37
- Track 5 : Cloudyecho_38
- Track 6 : MOOREtheMARYer_39
- Track 7 : Pinnie_37
- Track 8 : Jolie2_37
- Track 9 : Mercurio_40
- Track 10 : Lemuria_39
- Track 11 : Stargaze_38
- Track 12 : Antsirabe_37
- Track 13 : YangYin_38
- Track 14 : Amymech_68, Ein37_68, Ubuntu_68, Kinbote_66, BloominB_67, Evanesce_67, DeepSoil15_68
- Track 15 : HH92_67, LilHazelNut_68, Webster2_68
- Track 16 : Amochick_69
- Track 17 : NovoPizza_73
- Track 18 : Gancho_67
- Track 19 : Daegal_71
- Track 20 : Cepens_53, PR_53, D12_52, Megabear_53, Argie_54, Taptic_53
- Track 21 : Jeon_53, GodPhather_54

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

The start number called the most often in the published annotations is 22, it was called in 9 of the 34 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

- Amymech_68, BloominB_67, Daegal_71, DeepSoil15_68, Ein37_68, Evanesce_67, Gancho_67, Kinbote_66, Ubuntu_68,

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

- Amochick_69, HH92_67, LilHazelNut_68, Webster2_68,

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

• Antsirabe_37, Argie_54, Avocado_38, Cambiare_39, Cepens_53, Cloudyecho_38, D12_52, FlagStaff_37, GodPhather_54, GodSpeed_37, Jeon_53, Jolie2_37, Lemuria_39, MOOREtheMARYer_39, Megabear_53, Mercurio_40, NovoPizza_73, PR_53, Pace1224_37, Pinnie_37, Stargaze_38, Taptic_53, YangYin_38,

Summary by start number:

Start 19:

- Found in 6 of 36 (16.7%) of genes in pham
- Manual Annotations of this start: 6 of 34
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Antsirabe_37 (G5), Cloudyecho_38 (G3), MOOREtheMARYer_39 (G3), Pinnie_37 (G3), Stargaze_38 (G5), YangYin_38 (G5),

Start 20:

- Found in 16 of 36 (44.4%) of genes in pham
- Manual Annotations of this start: 6 of 34
- Called 43.8% of time when present
- Phage (with cluster) where this start called: Amochick_69 (Q), HH92_67 (Q), Jolie2_37 (G4), Lemuria_39 (G4), LilHazelNut_68 (Q), Mercurio_40 (G4), Webster2_68 (Q),

Start 21:

- Found in 6 of 36 (16.7%) of genes in pham
- Manual Annotations of this start: 4 of 34
- Called 83.3% of time when present
- Phage (with cluster) where this start called: Avocado_38 (G2), Cambiare_39 (G2), FlagStaff_37 (G2), GodSpeed_37 (G2), Pace1224_37 (G2),

Start 22:

- Found in 13 of 36 (36.1%) of genes in pham
- Manual Annotations of this start: 9 of 34
- Called 69.2% of time when present
- Phage (with cluster) where this start called: Amymech_68 (Q), BloominB_67 (Q), Daegal_71 (Q), DeepSoil15_68 (Q), Ein37_68 (Q), Evanesce_67 (Q), Gancho_67 (Q), Kinbote_66 (Q), Ubuntu_68 (Q),

Start 23:

- Found in 1 of 36 (2.8%) of genes in pham
- Manual Annotations of this start: 1 of 34
- Called 100.0% of time when present
- Phage (with cluster) where this start called: NovoPizza_73 (Q),

Start 25:

- Found in 8 of 36 (22.2%) of genes in pham
- Manual Annotations of this start: 8 of 34
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Argie_54 (W), Cepens_53 (W), D12_52 (W), GodPhather_54 (W), Jeon_53 (W), Megabear_53 (W), PR_53 (W), Taptic_53 (W),

Summary by clusters:

There are 6 clusters represented in this pham: G5, G4, G3, G2, Q, W,

Info for manual annotations of cluster G2:

- Start number 21 was manually annotated 4 times for cluster G2.

Info for manual annotations of cluster G3:

- Start number 19 was manually annotated 3 times for cluster G3.

Info for manual annotations of cluster G4:

- Start number 20 was manually annotated 2 times for cluster G4.

Info for manual annotations of cluster G5:

- Start number 19 was manually annotated 3 times for cluster G5.

Info for manual annotations of cluster Q:

- Start number 20 was manually annotated 4 times for cluster Q.
- Start number 22 was manually annotated 9 times for cluster Q.
- Start number 23 was manually annotated 1 time for cluster Q.

Info for manual annotations of cluster W:

- Start number 25 was manually annotated 8 times for cluster W.

Gene Information:

Gene: Amochick_69 Start: 46041, Stop: 46259, Start Num: 20

Candidate Starts for Amochick_69:

(2, 45765), (14, 46008), (Start: 20 @46041 has 6 MA's), (Start: 22 @46056 has 9 MA's), (27, 46131), (28, 46161), (30, 46182), (31, 46185), (34, 46215), (35, 46218), (39, 46251),

Gene: Amymech_68 Start: 45575, Stop: 45763, Start Num: 22

Candidate Starts for Amymech_68:

(2, 45284), (14, 45527), (Start: 20 @45560 has 6 MA's), (Start: 22 @45575 has 9 MA's), (24, 45596), (27, 45635), (31, 45689), (34, 45719), (35, 45722), (39, 45755),

Gene: Antsirabe_37 Start: 31643, Stop: 31870, Start Num: 19

Candidate Starts for Antsirabe_37:

(Start: 19 @31643 has 6 MA's), (29, 31772), (33, 31787),

Gene: Argie_54 Start: 44538, Stop: 44732, Start Num: 25

Candidate Starts for Argie_54:

(Start: 25 @44538 has 8 MA's), (27, 44565), (38, 44703),

Gene: Avocado_38 Start: 32303, Stop: 32527, Start Num: 21

Candidate Starts for Avocado_38:

(Start: 21 @32303 has 4 MA's), (29, 32429), (36, 32510),

Gene: BloominB_67 Start: 45575, Stop: 45763, Start Num: 22

Candidate Starts for BloominB_67:

(2, 45284), (14, 45527), (Start: 20 @45560 has 6 MA's), (Start: 22 @45575 has 9 MA's), (24, 45596), (27, 45635), (31, 45689), (34, 45719), (35, 45722), (39, 45755),

Gene: Cambiare_39 Start: 32576, Stop: 32797, Start Num: 21
Candidate Starts for Cambiare_39:
(Start: 21 @32576 has 4 MA's), (27, 32651), (33, 32717), (36, 32780),

Gene: Cepens_53 Start: 44253, Stop: 44447, Start Num: 25
Candidate Starts for Cepens_53:
(Start: 25 @44253 has 8 MA's), (27, 44280), (38, 44418),

Gene: Cloudyecho_38 Start: 32003, Stop: 32230, Start Num: 19
Candidate Starts for Cloudyecho_38:
(Start: 19 @32003 has 6 MA's), (33, 32147), (36, 32213),

Gene: D12_52 Start: 44801, Stop: 44995, Start Num: 25
Candidate Starts for D12_52:
(Start: 25 @44801 has 8 MA's), (27, 44828), (38, 44966),

Gene: Daegal_71 Start: 46618, Stop: 46821, Start Num: 22
Candidate Starts for Daegal_71:
(2, 46327), (14, 46570), (Start: 20 @46603 has 6 MA's), (Start: 22 @46618 has 9 MA's), (27, 46693), (28, 46723), (30, 46744), (31, 46747), (34, 46777), (35, 46780), (39, 46813),

Gene: DeepSoil15_68 Start: 45575, Stop: 45763, Start Num: 22
Candidate Starts for DeepSoil15_68:
(2, 45284), (14, 45527), (Start: 20 @45560 has 6 MA's), (Start: 22 @45575 has 9 MA's), (24, 45596), (27, 45635), (31, 45689), (34, 45719), (35, 45722), (39, 45755),

Gene: Ein37_68 Start: 45575, Stop: 45763, Start Num: 22
Candidate Starts for Ein37_68:
(2, 45284), (14, 45527), (Start: 20 @45560 has 6 MA's), (Start: 22 @45575 has 9 MA's), (24, 45596), (27, 45635), (31, 45689), (34, 45719), (35, 45722), (39, 45755),

Gene: Evanesce_67 Start: 45575, Stop: 45763, Start Num: 22
Candidate Starts for Evanesce_67:
(2, 45284), (14, 45527), (Start: 20 @45560 has 6 MA's), (Start: 22 @45575 has 9 MA's), (24, 45596), (27, 45635), (31, 45689), (34, 45719), (35, 45722), (39, 45755),

Gene: FlagStaff_37 Start: 31731, Stop: 31955, Start Num: 21
Candidate Starts for FlagStaff_37:
(6, 31503), (Start: 21 @31731 has 4 MA's), (36, 31938),

Gene: Gancho_67 Start: 45302, Stop: 45490, Start Num: 22
Candidate Starts for Gancho_67:
(14, 45254), (Start: 20 @45287 has 6 MA's), (Start: 22 @45302 has 9 MA's), (24, 45323), (27, 45362), (28, 45392), (30, 45413), (31, 45416), (34, 45446), (35, 45449), (39, 45482),

Gene: GodPhather_54 Start: 45041, Stop: 45235, Start Num: 25
Candidate Starts for GodPhather_54:
(18, 44990), (Start: 25 @45041 has 8 MA's), (27, 45068), (38, 45206),

Gene: GodSpeed_37 Start: 31834, Stop: 32052, Start Num: 21

Candidate Starts for GodSpeed_37:

(1, 31366), (3, 31570), (6, 31615), (Start: 21 @31834 has 4 MA's), (26, 31903), (33, 31972), (36, 32035),

Gene: HH92_67 Start: 45560, Stop: 45763, Start Num: 20

Candidate Starts for HH92_67:

(2, 45284), (14, 45527), (Start: 20 @45560 has 6 MA's), (Start: 22 @45575 has 9 MA's), (24, 45596), (27, 45635), (31, 45689), (34, 45719), (35, 45722), (39, 45755),

Gene: Jeon_53 Start: 44783, Stop: 44977, Start Num: 25

Candidate Starts for Jeon_53:

(18, 44732), (Start: 25 @44783 has 8 MA's), (27, 44810), (38, 44948),

Gene: Jolie2_37 Start: 30669, Stop: 30899, Start Num: 20

Candidate Starts for Jolie2_37:

(6, 30444), (Start: 20 @30669 has 6 MA's), (Start: 21 @30672 has 4 MA's), (26, 30726), (40, 30879),

Gene: Kinbote_66 Start: 45575, Stop: 45763, Start Num: 22

Candidate Starts for Kinbote_66:

(2, 45284), (14, 45527), (Start: 20 @45560 has 6 MA's), (Start: 22 @45575 has 9 MA's), (24, 45596), (27, 45635), (31, 45689), (34, 45719), (35, 45722), (39, 45755),

Gene: Lemuria_39 Start: 32014, Stop: 32280, Start Num: 20

Candidate Starts for Lemuria_39:

(16, 31996), (Start: 20 @32014 has 6 MA's), (40, 32260),

Gene: LilHazelNut_68 Start: 45560, Stop: 45763, Start Num: 20

Candidate Starts for LilHazelNut_68:

(2, 45284), (14, 45527), (Start: 20 @45560 has 6 MA's), (Start: 22 @45575 has 9 MA's), (24, 45596), (27, 45635), (31, 45689), (34, 45719), (35, 45722), (39, 45755),

Gene: MOOREtheMARYer_39 Start: 32267, Stop: 32494, Start Num: 19

Candidate Starts for MOOREtheMARYer_39:

(4, 32006), (5, 32024), (7, 32054), (10, 32150), (15, 32246), (Start: 19 @32267 has 6 MA's), (28, 32375), (36, 32477),

Gene: Megabear_53 Start: 44174, Stop: 44368, Start Num: 25

Candidate Starts for Megabear_53:

(Start: 25 @44174 has 8 MA's), (27, 44201), (38, 44339),

Gene: Mercurio_40 Start: 32511, Stop: 32777, Start Num: 20

Candidate Starts for Mercurio_40:

(Start: 20 @32511 has 6 MA's), (40, 32757),

Gene: NovoPizza_73 Start: 47729, Stop: 47911, Start Num: 23

Candidate Starts for NovoPizza_73:

(8, 47519), (11, 47594), (12, 47597), (17, 47693), (Start: 23 @47729 has 1 MA's), (27, 47783), (28, 47813), (31, 47837), (34, 47867), (35, 47870), (37, 47900),

Gene: PR_53 Start: 44778, Stop: 44972, Start Num: 25

Candidate Starts for PR_53:

(Start: 25 @44778 has 8 MA's), (27, 44805), (38, 44943),

Gene: Pace1224_37 Start: 31731, Stop: 31955, Start Num: 21

Candidate Starts for Pace1224_37:

(6, 31503), (Start: 21 @31731 has 4 MA's), (36, 31938),

Gene: Pinnie_37 Start: 31975, Stop: 32202, Start Num: 19

Candidate Starts for Pinnie_37:

(9, 31810), (13, 31897), (Start: 19 @31975 has 6 MA's), (28, 32083), (36, 32185),

Gene: Stargaze_38 Start: 31966, Stop: 32193, Start Num: 19

Candidate Starts for Stargaze_38:

(Start: 19 @31966 has 6 MA's), (29, 32095), (32, 32104), (33, 32110), (36, 32176),

Gene: Taptic_53 Start: 44174, Stop: 44368, Start Num: 25

Candidate Starts for Taptic_53:

(Start: 25 @44174 has 8 MA's), (27, 44201), (38, 44339),

Gene: Ubuntu_68 Start: 45575, Stop: 45763, Start Num: 22

Candidate Starts for Ubuntu_68:

(2, 45284), (14, 45527), (Start: 20 @45560 has 6 MA's), (Start: 22 @45575 has 9 MA's), (24, 45596), (27, 45635), (31, 45689), (34, 45719), (35, 45722), (39, 45755),

Gene: Webster2_68 Start: 45560, Stop: 45763, Start Num: 20

Candidate Starts for Webster2_68:

(2, 45284), (14, 45527), (Start: 20 @45560 has 6 MA's), (Start: 22 @45575 has 9 MA's), (24, 45596), (27, 45635), (31, 45689), (34, 45719), (35, 45722), (39, 45755),

Gene: YangYin_38 Start: 31992, Stop: 32219, Start Num: 19

Candidate Starts for YangYin_38:

(Start: 19 @31992 has 6 MA's), (26, 32067), (29, 32121), (33, 32136), (36, 32202),