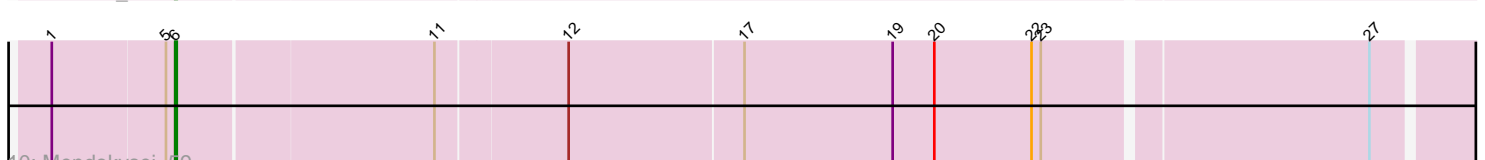
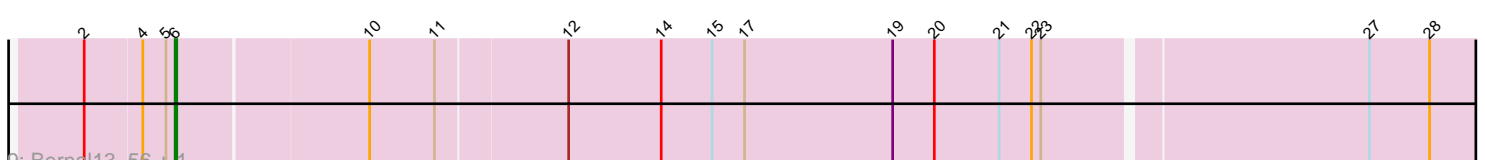
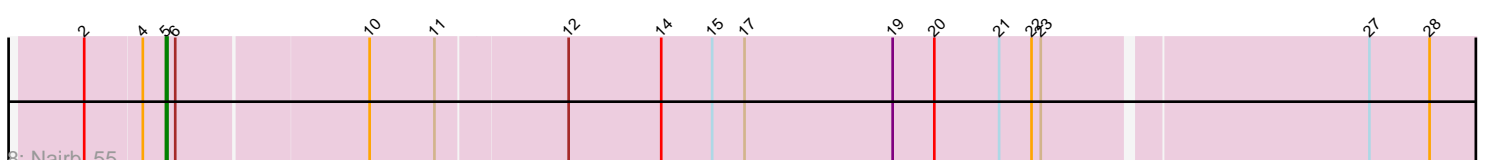
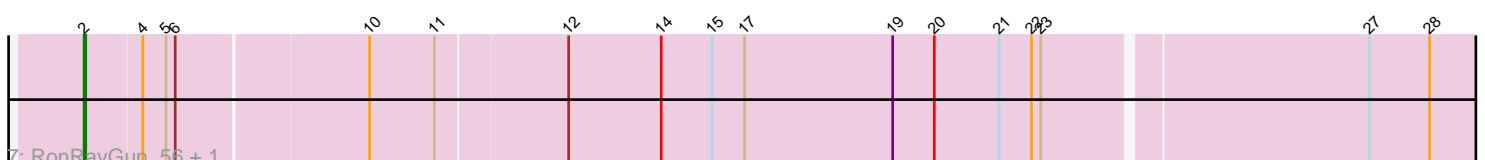
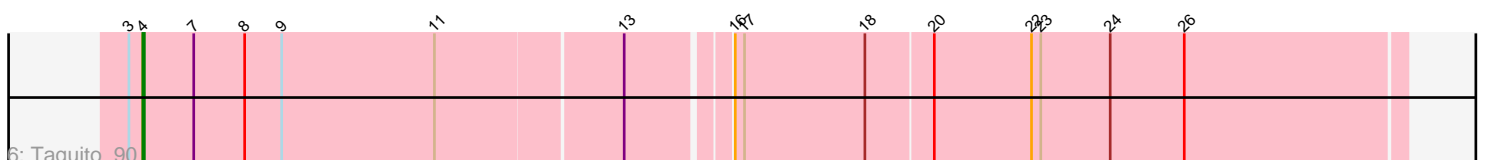
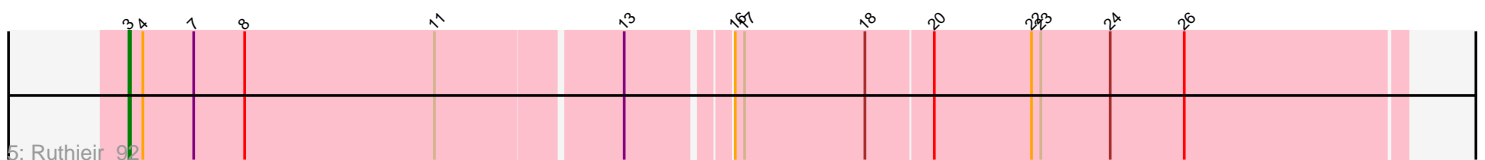
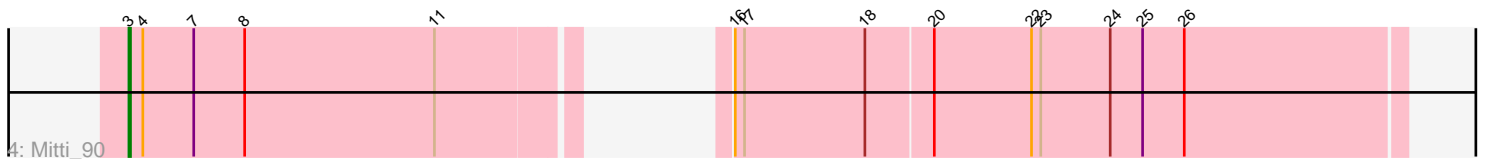
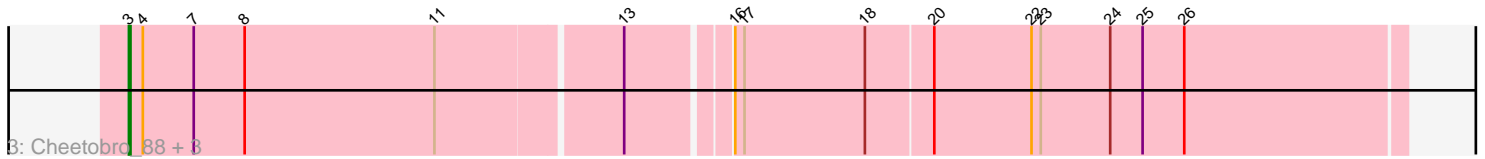
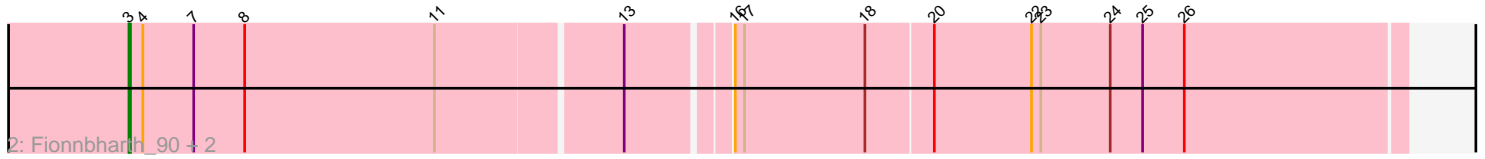
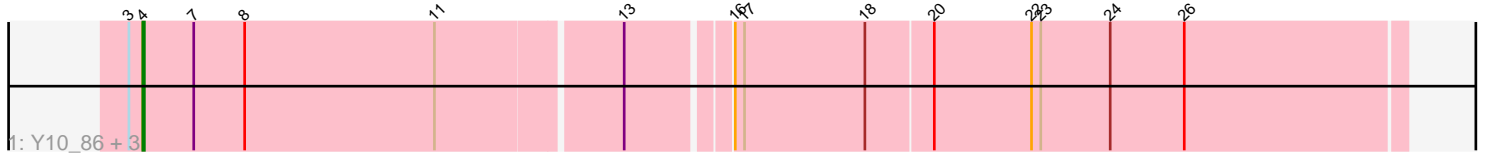


Pham 158194



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 158194 Report

This analysis was run 04/13/24 on database version 558.

Pham number 158194 has 20 members, 0 are drafts.

Phages represented in each track:

- Track 1 : Y10_86, JF1_90, Y2_86, OmniCritical_90
- Track 2 : Fionnbharth_90, Eponine_92, Wintermute_90
- Track 3 : Cheetobro_88, SamScheppers_89, Chancellor_90, Slarp_88
- Track 4 : Mitti_90
- Track 5 : Ruthiejr_92
- Track 6 : Taquito_90
- Track 7 : RonRayGun_56, Whitty_55
- Track 8 : Nairb_55
- Track 9 : Bernal13_56, Ibrahim_56
- Track 10 : Mendokysei_59

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 9 of the 20 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

- Chancellor_90, Cheetobro_88, Eponine_92, Fionnbharth_90, Mitti_90, Ruthiejr_92, SamScheppers_89, Slarp_88, Wintermute_90,

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

- JF1_90, OmniCritical_90, Taquito_90, Y10_86, Y2_86,

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

- Bernal13_56, Ibrahim_56, Mendokysei_59, Nairb_55, RonRayGun_56, Whitty_55,

Summary by start number:

Start 2:

- Found in 5 of 20 (25.0%) of genes in pham
- Manual Annotations of this start: 2 of 20
- Called 40.0% of time when present
- Phage (with cluster) where this start called: RonRayGun_56 (T), Whitty_55 (T),

Start 3:

- Found in 14 of 20 (70.0%) of genes in pham
- Manual Annotations of this start: 9 of 20
- Called 64.3% of time when present
- Phage (with cluster) where this start called: Chancellor_90 (K4), Cheetobro_88 (K4), Eponine_92 (K4), Fionnbharth_90 (K4), Mitti_90 (K4), Ruthiejr_92 (K4), SamScheppers_89 (K4), Slarp_88 (K4), Wintermute_90 (K4),

Start 4:

- Found in 19 of 20 (95.0%) of genes in pham
- Manual Annotations of this start: 5 of 20
- Called 26.3% of time when present
- Phage (with cluster) where this start called: JF1_90 (K4), OmniCritical_90 (K4), Taquito_90 (K4), Y10_86 (K4), Y2_86 (K4),

Start 5:

- Found in 6 of 20 (30.0%) of genes in pham
- Manual Annotations of this start: 1 of 20
- Called 16.7% of time when present
- Phage (with cluster) where this start called: Nairb_55 (T),

Start 6:

- Found in 6 of 20 (30.0%) of genes in pham
- Manual Annotations of this start: 3 of 20
- Called 50.0% of time when present
- Phage (with cluster) where this start called: Bernal13_56 (T), Ibrahim_56 (T), Mendokysej_59 (T),

Summary by clusters:

There are 2 clusters represented in this pham: T, K4,

Info for manual annotations of cluster K4:

- Start number 3 was manually annotated 9 times for cluster K4.
- Start number 4 was manually annotated 5 times for cluster K4.

Info for manual annotations of cluster T:

- Start number 2 was manually annotated 2 times for cluster T.
- Start number 5 was manually annotated 1 time for cluster T.
- Start number 6 was manually annotated 3 times for cluster T.

Gene Information:

Gene: Bernal13_56 Start: 40310, Stop: 39471, Start Num: 6

Candidate Starts for Bernal13_56:

(Start: 2 @40367 has 2 MA's), (Start: 4 @40331 has 5 MA's), (Start: 5 @40316 has 1 MA's), (Start: 6 @40310 has 3 MA's), (10, 40190), (11, 40148), (12, 40067), (14, 40007), (15, 39974), (17, 39953), (19, 39857), (20, 39830), (21, 39788), (22, 39767), (23, 39761), (27, 39560), (28, 39521),

Gene: Chancellor_90 Start: 54032, Stop: 54832, Start Num: 3

Candidate Starts for Chancellor_90:

(Start: 3 @54032 has 9 MA's), (Start: 4 @54041 has 5 MA's), (7, 54074), (8, 54107), (11, 54230), (13, 54344), (16, 54404), (17, 54410), (18, 54488), (20, 54530), (22, 54593), (23, 54599), (24, 54644), (25, 54665), (26, 54692),

Gene: Cheetobro_88 Start: 53586, Stop: 54386, Start Num: 3

Candidate Starts for Cheetobro_88:

(Start: 3 @53586 has 9 MA's), (Start: 4 @53595 has 5 MA's), (7, 53628), (8, 53661), (11, 53784), (13, 53898), (16, 53958), (17, 53964), (18, 54042), (20, 54084), (22, 54147), (23, 54153), (24, 54198), (25, 54219), (26, 54246),

Gene: Eponine_92 Start: 55012, Stop: 55812, Start Num: 3

Candidate Starts for Eponine_92:

(Start: 3 @55012 has 9 MA's), (Start: 4 @55021 has 5 MA's), (7, 55054), (8, 55087), (11, 55210), (13, 55324), (16, 55384), (17, 55390), (18, 55468), (20, 55510), (22, 55573), (23, 55579), (24, 55624), (25, 55645), (26, 55672),

Gene: Fionnbharth_90 Start: 54410, Stop: 55210, Start Num: 3

Candidate Starts for Fionnbharth_90:

(Start: 3 @54410 has 9 MA's), (Start: 4 @54419 has 5 MA's), (7, 54452), (8, 54485), (11, 54608), (13, 54722), (16, 54782), (17, 54788), (18, 54866), (20, 54908), (22, 54971), (23, 54977), (24, 55022), (25, 55043), (26, 55070),

Gene: Ibrahim_56 Start: 40514, Stop: 39675, Start Num: 6

Candidate Starts for Ibrahim_56:

(Start: 2 @40571 has 2 MA's), (Start: 4 @40535 has 5 MA's), (Start: 5 @40520 has 1 MA's), (Start: 6 @40514 has 3 MA's), (10, 40394), (11, 40352), (12, 40271), (14, 40211), (15, 40178), (17, 40157), (19, 40061), (20, 40034), (21, 39992), (22, 39971), (23, 39965), (27, 39764), (28, 39725),

Gene: JF1_90 Start: 54343, Stop: 55134, Start Num: 4

Candidate Starts for JF1_90:

(Start: 3 @54334 has 9 MA's), (Start: 4 @54343 has 5 MA's), (7, 54376), (8, 54409), (11, 54532), (13, 54646), (16, 54706), (17, 54712), (18, 54790), (20, 54832), (22, 54895), (23, 54901), (24, 54946), (26, 54994),

Gene: Mendokysei_59 Start: 41092, Stop: 40265, Start Num: 6

Candidate Starts for Mendokysei_59:

(1, 41170), (Start: 5 @41098 has 1 MA's), (Start: 6 @41092 has 3 MA's), (11, 40930), (12, 40849), (17, 40738), (19, 40642), (20, 40615), (22, 40552), (23, 40546), (27, 40345),

Gene: Mitti_90 Start: 54306, Stop: 55028, Start Num: 3

Candidate Starts for Mitti_90:

(Start: 3 @54306 has 9 MA's), (Start: 4 @54315 has 5 MA's), (7, 54348), (8, 54381), (11, 54504), (16, 54600), (17, 54606), (18, 54684), (20, 54726), (22, 54789), (23, 54795), (24, 54840), (25, 54861), (26, 54888),

Gene: Nairb_55 Start: 40316, Stop: 39471, Start Num: 5

Candidate Starts for Nairb_55:

(Start: 2 @40367 has 2 MA's), (Start: 4 @40331 has 5 MA's), (Start: 5 @40316 has 1 MA's), (Start: 6 @40310 has 3 MA's), (10, 40190), (11, 40148), (12, 40067), (14, 40007), (15, 39974), (17, 39953), (19, 39857), (20, 39830), (21, 39788), (22, 39767), (23, 39761), (27, 39560), (28, 39521),

Gene: OmniCritical_90 Start: 54317, Stop: 55108, Start Num: 4

Candidate Starts for OmniCritical_90:

(Start: 3 @54308 has 9 MA's), (Start: 4 @54317 has 5 MA's), (7, 54350), (8, 54383), (11, 54506), (13, 54620), (16, 54680), (17, 54686), (18, 54764), (20, 54806), (22, 54869), (23, 54875), (24, 54920), (26, 54968),

Gene: RonRayGun_56 Start: 40571, Stop: 39675, Start Num: 2

Candidate Starts for RonRayGun_56:

(Start: 2 @40571 has 2 MA's), (Start: 4 @40535 has 5 MA's), (Start: 5 @40520 has 1 MA's), (Start: 6 @40514 has 3 MA's), (10, 40394), (11, 40352), (12, 40271), (14, 40211), (15, 40178), (17, 40157), (19, 40061), (20, 40034), (21, 39992), (22, 39971), (23, 39965), (27, 39764), (28, 39725),

Gene: Ruthiejr_92 Start: 54201, Stop: 55001, Start Num: 3

Candidate Starts for Ruthiejr_92:

(Start: 3 @54201 has 9 MA's), (Start: 4 @54210 has 5 MA's), (7, 54243), (8, 54276), (11, 54399), (13, 54513), (16, 54573), (17, 54579), (18, 54657), (20, 54699), (22, 54762), (23, 54768), (24, 54813), (26, 54861),

Gene: SamScheppers_89 Start: 54686, Stop: 55486, Start Num: 3

Candidate Starts for SamScheppers_89:

(Start: 3 @54686 has 9 MA's), (Start: 4 @54695 has 5 MA's), (7, 54728), (8, 54761), (11, 54884), (13, 54998), (16, 55058), (17, 55064), (18, 55142), (20, 55184), (22, 55247), (23, 55253), (24, 55298), (25, 55319), (26, 55346),

Gene: Slarp_88 Start: 53589, Stop: 54389, Start Num: 3

Candidate Starts for Slarp_88:

(Start: 3 @53589 has 9 MA's), (Start: 4 @53598 has 5 MA's), (7, 53631), (8, 53664), (11, 53787), (13, 53901), (16, 53961), (17, 53967), (18, 54045), (20, 54087), (22, 54150), (23, 54156), (24, 54201), (25, 54222), (26, 54249),

Gene: Taquito_90 Start: 54661, Stop: 55455, Start Num: 4

Candidate Starts for Taquito_90:

(Start: 3 @54652 has 9 MA's), (Start: 4 @54661 has 5 MA's), (7, 54694), (8, 54727), (9, 54751), (11, 54850), (13, 54967), (16, 55027), (17, 55033), (18, 55111), (20, 55153), (22, 55216), (23, 55222), (24, 55267), (26, 55315),

Gene: Whitty_55 Start: 40368, Stop: 39472, Start Num: 2

Candidate Starts for Whitty_55:

(Start: 2 @40368 has 2 MA's), (Start: 4 @40332 has 5 MA's), (Start: 5 @40317 has 1 MA's), (Start: 6 @40311 has 3 MA's), (10, 40191), (11, 40149), (12, 40068), (14, 40008), (15, 39975), (17, 39954), (19, 39858), (20, 39831), (21, 39789), (22, 39768), (23, 39762), (27, 39561), (28, 39522),

Gene: Wintermute_90 Start: 54390, Stop: 55190, Start Num: 3

Candidate Starts for Wintermute_90:

(Start: 3 @54390 has 9 MA's), (Start: 4 @54399 has 5 MA's), (7, 54432), (8, 54465), (11, 54588), (13, 54702), (16, 54762), (17, 54768), (18, 54846), (20, 54888), (22, 54951), (23, 54957), (24, 55002), (25, 55023), (26, 55050),

Gene: Y10_86 Start: 54343, Stop: 55134, Start Num: 4

Candidate Starts for Y10_86:

(Start: 3 @54334 has 9 MA's), (Start: 4 @54343 has 5 MA's), (7, 54376), (8, 54409), (11, 54532), (13, 54646), (16, 54706), (17, 54712), (18, 54790), (20, 54832), (22, 54895), (23, 54901), (24, 54946), (26, 54994),

Gene: Y2_86 Start: 54343, Stop: 55134, Start Num: 4

Candidate Starts for Y2_86:

(Start: 3 @54334 has 9 MA's), (Start: 4 @54343 has 5 MA's), (7, 54376), (8, 54409), (11, 54532), (13, 54646), (16, 54706), (17, 54712), (18, 54790), (20, 54832), (22, 54895), (23, 54901), (24, 54946), (26, 54994),