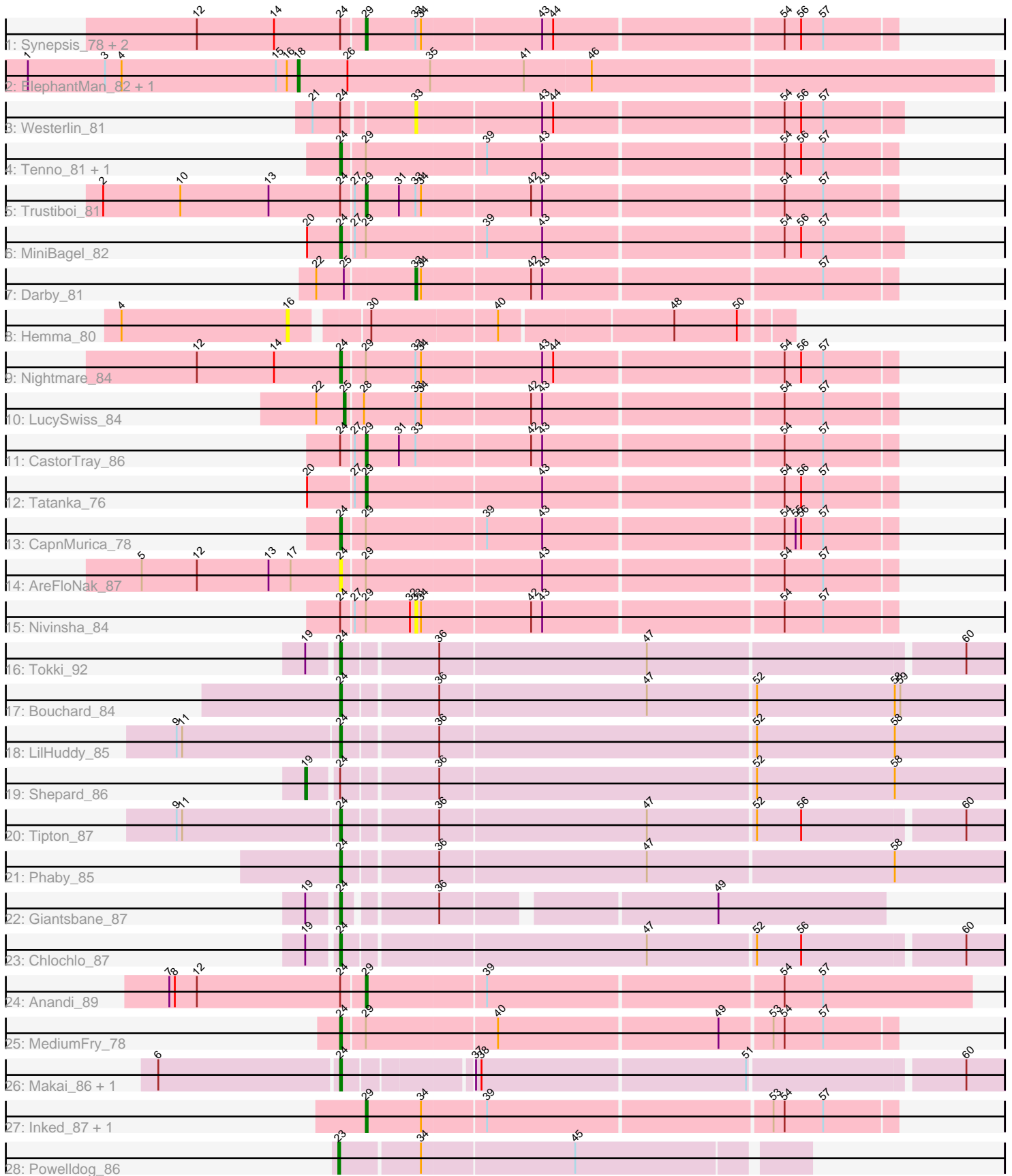


Pham 308970



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 308970 Report

This analysis was run 06/27/26 on database version 652.

Pham number 308970 has 34 members, 5 are drafts.

Phages represented in each track:

- Track 1 : Synopsis_78, DevitoJr_82, ScienceWizSam_84
- Track 2 : ElephantMan_82, Niktson_82
- Track 3 : Westerlin_81
- Track 4 : Tenno_81, Dinallo_76
- Track 5 : Trustiboi_81
- Track 6 : MiniBagel_82
- Track 7 : Darby_81
- Track 8 : Hemma_80
- Track 9 : Nightmare_84
- Track 10 : LucySwiss_84
- Track 11 : CastorTray_86
- Track 12 : Tatanka_76
- Track 13 : CapnMurica_78
- Track 14 : AreFloNak_87
- Track 15 : Nivinsha_84
- Track 16 : Tokki_92
- Track 17 : Bouchard_84
- Track 18 : LilHuddy_85
- Track 19 : Shepard_86
- Track 20 : Tipton_87
- Track 21 : Phaby_85
- Track 22 : Giantsbane_87
- Track 23 : Chlochlo_87
- Track 24 : Anandi_89
- Track 25 : MediumFry_78
- Track 26 : Makai_86, Truckee_83
- Track 27 : Inked_87, Zippen_88
- Track 28 : Powelldog_86

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

The start number called the most often in the published annotations is 24, it was called in 14 of the 29 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

- AreFloNak_87, Bouchard_84, CapnMurica_78, Chlochlo_87, Dinallo_76, Giantsbane_87, LilHuddy_85, Makai_86, MediumFry_78, MiniBagel_82, Nightmare_84, Phaby_85, Tenno_81, Tipton_87, Tokki_92, Truckee_83,

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

- Anandi_89, CastorTray_86, DevitoJr_82, Nivinsha_84, ScienceWizSam_84, Shepard_86, Synepsis_78, Trustiboi_81, Westerlin_81,

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

- Darby_81, ElephantMan_82, Hemma_80, Inked_87, LucySwiss_84, Niktson_82, Powellldog_86, Tatanka_76, Zippen_88,

Summary by start number:

Start 16:

- Found in 3 of 34 (8.8%) of genes in pham
- No Manual Annotations of this start.
- Called 33.3% of time when present
- Phage (with cluster) where this start called: Hemma_80 (AU1),

Start 18:

- Found in 2 of 34 (5.9%) of genes in pham
- Manual Annotations of this start: 2 of 29
- Called 100.0% of time when present
- Phage (with cluster) where this start called: ElephantMan_82 (AU1), Niktson_82 (AU1),

Start 19:

- Found in 4 of 34 (11.8%) of genes in pham
- Manual Annotations of this start: 1 of 29
- Called 25.0% of time when present
- Phage (with cluster) where this start called: Shepard_86 (AU2),

Start 23:

- Found in 1 of 34 (2.9%) of genes in pham
- Manual Annotations of this start: 1 of 29
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Powellldog_86 (AW),

Start 24:

- Found in 25 of 34 (73.5%) of genes in pham
- Manual Annotations of this start: 14 of 29
- Called 64.0% of time when present
- Phage (with cluster) where this start called: AreFloNak_87 (AU1), Bouchard_84 (AU2), CapnMurica_78 (AU1), Chlochlo_87 (AU2), Dinallo_76 (AU1), Giantsbane_87 (AU2), LilHuddy_85 (AU2), Makai_86 (AU5), MediumFry_78 (AU4), MiniBagel_82 (AU1), Nightmare_84 (AU1), Phaby_85 (AU2), Tenno_81 (AU1), Tipton_87 (AU2), Tokki_92 (AU2), Truckee_83 (AU5),

Start 25:

- Found in 2 of 34 (5.9%) of genes in pham
- Manual Annotations of this start: 1 of 29

- Called 50.0% of time when present
- Phage (with cluster) where this start called: LucySwiss_84 (AU1),

Start 29:

- Found in 17 of 34 (50.0%) of genes in pham
- Manual Annotations of this start: 9 of 29
- Called 52.9% of time when present
- Phage (with cluster) where this start called: Anandi_89 (AU4), CastorTray_86 (AU1), DevitoJr_82 (AU1), Inked_87 (AU7), ScienceWizSam_84 (AU1), Synopsis_78 (AU1), Tatanka_76 (AU1), Trustiboi_81 (AU1), Zippen_88 (AU7),

Start 33:

- Found in 10 of 34 (29.4%) of genes in pham
- Manual Annotations of this start: 1 of 29
- Called 30.0% of time when present
- Phage (with cluster) where this start called: Darby_81 (AU1), Nivinsha_84 (AU1), Westerlin_81 (AU1),

Summary by clusters:

There are 6 clusters represented in this pham: AU7, AU1, AU2, AU5, AU4, AW,

Info for manual annotations of cluster AU1:

- Start number 18 was manually annotated 2 times for cluster AU1.
- Start number 24 was manually annotated 4 times for cluster AU1.
- Start number 25 was manually annotated 1 time for cluster AU1.
- Start number 29 was manually annotated 6 times for cluster AU1.
- Start number 33 was manually annotated 1 time for cluster AU1.

Info for manual annotations of cluster AU2:

- Start number 19 was manually annotated 1 time for cluster AU2.
- Start number 24 was manually annotated 7 times for cluster AU2.

Info for manual annotations of cluster AU4:

- Start number 24 was manually annotated 1 time for cluster AU4.
- Start number 29 was manually annotated 1 time for cluster AU4.

Info for manual annotations of cluster AU5:

- Start number 24 was manually annotated 2 times for cluster AU5.

Info for manual annotations of cluster AU7:

- Start number 29 was manually annotated 2 times for cluster AU7.

Info for manual annotations of cluster AW:

- Start number 23 was manually annotated 1 time for cluster AW.

Gene Information:

Gene: Anandi_89 Start: 52234, Stop: 52554, Start Num: 29

Candidate Starts for Anandi_89:

(7, 52129), (8, 52132), (12, 52144), (Start: 24 @52222 has 14 MA's), (Start: 29 @52234 has 9 MA's), (39, 52297), (54, 52453), (57, 52474),

Gene: AreFloNak_87 Start: 52158, Stop: 52448, Start Num: 24

Candidate Starts for AreFloNak_87:

(5, 52050), (12, 52080), (13, 52119), (17, 52131), (Start: 24 @52158 has 14 MA's), (Start: 29 @52170 has 9 MA's), (43, 52263), (54, 52389), (57, 52410),

Gene: Bouchard_84 Start: 52033, Stop: 52383, Start Num: 24

Candidate Starts for Bouchard_84:

(Start: 24 @52033 has 14 MA's), (36, 52081), (47, 52192), (52, 52249), (58, 52324), (59, 52327),

Gene: CapnMurica_78 Start: 52343, Stop: 52633, Start Num: 24

Candidate Starts for CapnMurica_78:

(Start: 24 @52343 has 14 MA's), (Start: 29 @52355 has 9 MA's), (39, 52418), (43, 52448), (54, 52574), (55, 52580), (56, 52583), (57, 52595),

Gene: CastorTray_86 Start: 52899, Stop: 53177, Start Num: 29

Candidate Starts for CastorTray_86:

(Start: 24 @52887 has 14 MA's), (27, 52893), (Start: 29 @52899 has 9 MA's), (31, 52917), (Start: 33 @52926 has 1 MA's), (42, 52986), (43, 52992), (54, 53118), (57, 53139),

Gene: Chlochlo_87 Start: 52195, Stop: 52539, Start Num: 24

Candidate Starts for Chlochlo_87:

(Start: 19 @52180 has 1 MA's), (Start: 24 @52195 has 14 MA's), (47, 52354), (52, 52411), (56, 52435), (60, 52519),

Gene: Darby_81 Start: 52415, Stop: 52666, Start Num: 33

Candidate Starts for Darby_81:

(22, 52364), (Start: 25 @52379 has 1 MA's), (Start: 33 @52415 has 1 MA's), (34, 52418), (42, 52475), (43, 52481), (57, 52628),

Gene: DevitoJr_82 Start: 52047, Stop: 52325, Start Num: 29

Candidate Starts for DevitoJr_82:

(12, 51957), (14, 51999), (Start: 24 @52035 has 14 MA's), (Start: 29 @52047 has 9 MA's), (Start: 33 @52074 has 1 MA's), (34, 52077), (43, 52140), (44, 52146), (54, 52266), (56, 52275), (57, 52287),

Gene: Dinallo_76 Start: 52586, Stop: 52876, Start Num: 24

Candidate Starts for Dinallo_76:

(Start: 24 @52586 has 14 MA's), (Start: 29 @52598 has 9 MA's), (39, 52661), (43, 52691), (54, 52817), (56, 52826), (57, 52838),

Gene: ElephantMan_82 Start: 52676, Stop: 53050, Start Num: 18

Candidate Starts for ElephantMan_82:

(1, 52529), (3, 52571), (4, 52580), (15, 52664), (16, 52670), (Start: 18 @52676 has 2 MA's), (26, 52703), (35, 52748), (41, 52799), (46, 52835),

Gene: Giantsbane_87 Start: 51659, Stop: 51931, Start Num: 24

Candidate Starts for Giantsbane_87:

(Start: 19 @51644 has 1 MA's), (Start: 24 @51659 has 14 MA's), (36, 51704), (49, 51842),

Gene: Hemma_80 Start: 49940, Stop: 50191, Start Num: 16

Candidate Starts for Hemma_80:

(4, 49850), (16, 49940), (30, 49976), (40, 50042), (48, 50132), (50, 50165),

Gene: Inked_87 Start: 52710, Stop: 52988, Start Num: 29

Candidate Starts for Inked_87:

(Start: 29 @52710 has 9 MA's), (34, 52740), (39, 52773), (53, 52923), (54, 52929), (57, 52950),

Gene: LilHuddy_85 Start: 52109, Stop: 52459, Start Num: 24

Candidate Starts for LilHuddy_85:

(9, 52022), (11, 52025), (Start: 24 @52109 has 14 MA's), (36, 52157), (52, 52325), (58, 52400),

Gene: LucySwiss_84 Start: 52293, Stop: 52580, Start Num: 25

Candidate Starts for LucySwiss_84:

(22, 52278), (Start: 25 @52293 has 1 MA's), (28, 52302), (Start: 33 @52329 has 1 MA's), (34, 52332), (42, 52389), (43, 52395), (54, 52521), (57, 52542),

Gene: Makai_86 Start: 52779, Stop: 53117, Start Num: 24

Candidate Starts for Makai_86:

(6, 52683), (Start: 24 @52779 has 14 MA's), (37, 52842), (38, 52845), (51, 52986), (60, 53097),

Gene: MediumFry_78 Start: 51487, Stop: 51777, Start Num: 24

Candidate Starts for MediumFry_78:

(Start: 24 @51487 has 14 MA's), (Start: 29 @51499 has 9 MA's), (40, 51568), (49, 51685), (53, 51712), (54, 51718), (57, 51739),

Gene: MiniBagel_82 Start: 52344, Stop: 52637, Start Num: 24

Candidate Starts for MiniBagel_82:

(20, 52326), (Start: 24 @52344 has 14 MA's), (27, 52350), (Start: 29 @52356 has 9 MA's), (39, 52419), (43, 52449), (54, 52575), (56, 52584), (57, 52596),

Gene: Nightmare_84 Start: 52989, Stop: 53279, Start Num: 24

Candidate Starts for Nightmare_84:

(12, 52911), (14, 52953), (Start: 24 @52989 has 14 MA's), (Start: 29 @53001 has 9 MA's), (Start: 33 @53028 has 1 MA's), (34, 53031), (43, 53094), (44, 53100), (54, 53220), (56, 53229), (57, 53241),

Gene: Niktson_82 Start: 52676, Stop: 53050, Start Num: 18

Candidate Starts for Niktson_82:

(1, 52529), (3, 52571), (4, 52580), (15, 52664), (16, 52670), (Start: 18 @52676 has 2 MA's), (26, 52703), (35, 52748), (41, 52799), (46, 52835),

Gene: Nivinsha_84 Start: 52198, Stop: 52449, Start Num: 33

Candidate Starts for Nivinsha_84:

(Start: 24 @52159 has 14 MA's), (27, 52165), (Start: 29 @52171 has 9 MA's), (32, 52195), (Start: 33 @52198 has 1 MA's), (34, 52201), (42, 52258), (43, 52264), (54, 52390), (57, 52411),

Gene: Phaby_85 Start: 52012, Stop: 52362, Start Num: 24

Candidate Starts for Phaby_85:

(Start: 24 @52012 has 14 MA's), (36, 52060), (47, 52171), (58, 52303),

Gene: Powelldog_86 Start: 50695, Stop: 50937, Start Num: 23

Candidate Starts for Powelldog_86:

(Start: 23 @50695 has 1 MA's), (34, 50737), (45, 50818),

Gene: ScienceWizSam_84 Start: 52220, Stop: 52498, Start Num: 29

Candidate Starts for ScienceWizSam_84:

(12, 52130), (14, 52172), (Start: 24 @52208 has 14 MA's), (Start: 29 @52220 has 9 MA's), (Start: 33 @52247 has 1 MA's), (34, 52250), (43, 52313), (44, 52319), (54, 52439), (56, 52448), (57, 52460),

Gene: Shepard_86 Start: 52221, Stop: 52586, Start Num: 19

Candidate Starts for Shepard_86:

(Start: 19 @52221 has 1 MA's), (Start: 24 @52236 has 14 MA's), (36, 52284), (52, 52452), (58, 52527),

Gene: Synopsis_78 Start: 52058, Stop: 52336, Start Num: 29

Candidate Starts for Synopsis_78:

(12, 51968), (14, 52010), (Start: 24 @52046 has 14 MA's), (Start: 29 @52058 has 9 MA's), (Start: 33 @52085 has 1 MA's), (34, 52088), (43, 52151), (44, 52157), (54, 52277), (56, 52286), (57, 52298),

Gene: Tatanka_76 Start: 51974, Stop: 52252, Start Num: 29

Candidate Starts for Tatanka_76:

(20, 51944), (27, 51968), (Start: 29 @51974 has 9 MA's), (43, 52067), (54, 52193), (56, 52202), (57, 52214),

Gene: Tenno_81 Start: 52377, Stop: 52667, Start Num: 24

Candidate Starts for Tenno_81:

(Start: 24 @52377 has 14 MA's), (Start: 29 @52389 has 9 MA's), (39, 52452), (43, 52482), (54, 52608), (56, 52617), (57, 52629),

Gene: Tipton_87 Start: 52473, Stop: 52817, Start Num: 24

Candidate Starts for Tipton_87:

(9, 52386), (11, 52389), (Start: 24 @52473 has 14 MA's), (36, 52521), (47, 52632), (52, 52689), (56, 52713), (60, 52797),

Gene: Tokki_92 Start: 52593, Stop: 52937, Start Num: 24

Candidate Starts for Tokki_92:

(Start: 19 @52578 has 1 MA's), (Start: 24 @52593 has 14 MA's), (36, 52641), (47, 52752), (60, 52917),

Gene: Truckee_83 Start: 52472, Stop: 52810, Start Num: 24

Candidate Starts for Truckee_83:

(6, 52376), (Start: 24 @52472 has 14 MA's), (37, 52535), (38, 52538), (51, 52679), (60, 52790),

Gene: Trustiboi_81 Start: 52407, Stop: 52685, Start Num: 29

Candidate Starts for Trustiboi_81:

(2, 52266), (10, 52308), (13, 52356), (Start: 24 @52395 has 14 MA's), (27, 52401), (Start: 29 @52407 has 9 MA's), (31, 52425), (Start: 33 @52434 has 1 MA's), (34, 52437), (42, 52494), (43, 52500), (54, 52626), (57, 52647),

Gene: Westerlin_81 Start: 53658, Stop: 53912, Start Num: 33

Candidate Starts for Westerlin_81:

(21, 53607), (Start: 24 @53622 has 14 MA's), (Start: 33 @53658 has 1 MA's), (43, 53724), (44, 53730), (54, 53850), (56, 53859), (57, 53871),

Gene: Zippen_88 Start: 52752, Stop: 53030, Start Num: 29

Candidate Starts for Zippen_88:

(Start: 29 @52752 has 9 MA's), (34, 52782), (39, 52815), (53, 52965), (54, 52971), (57, 52992),