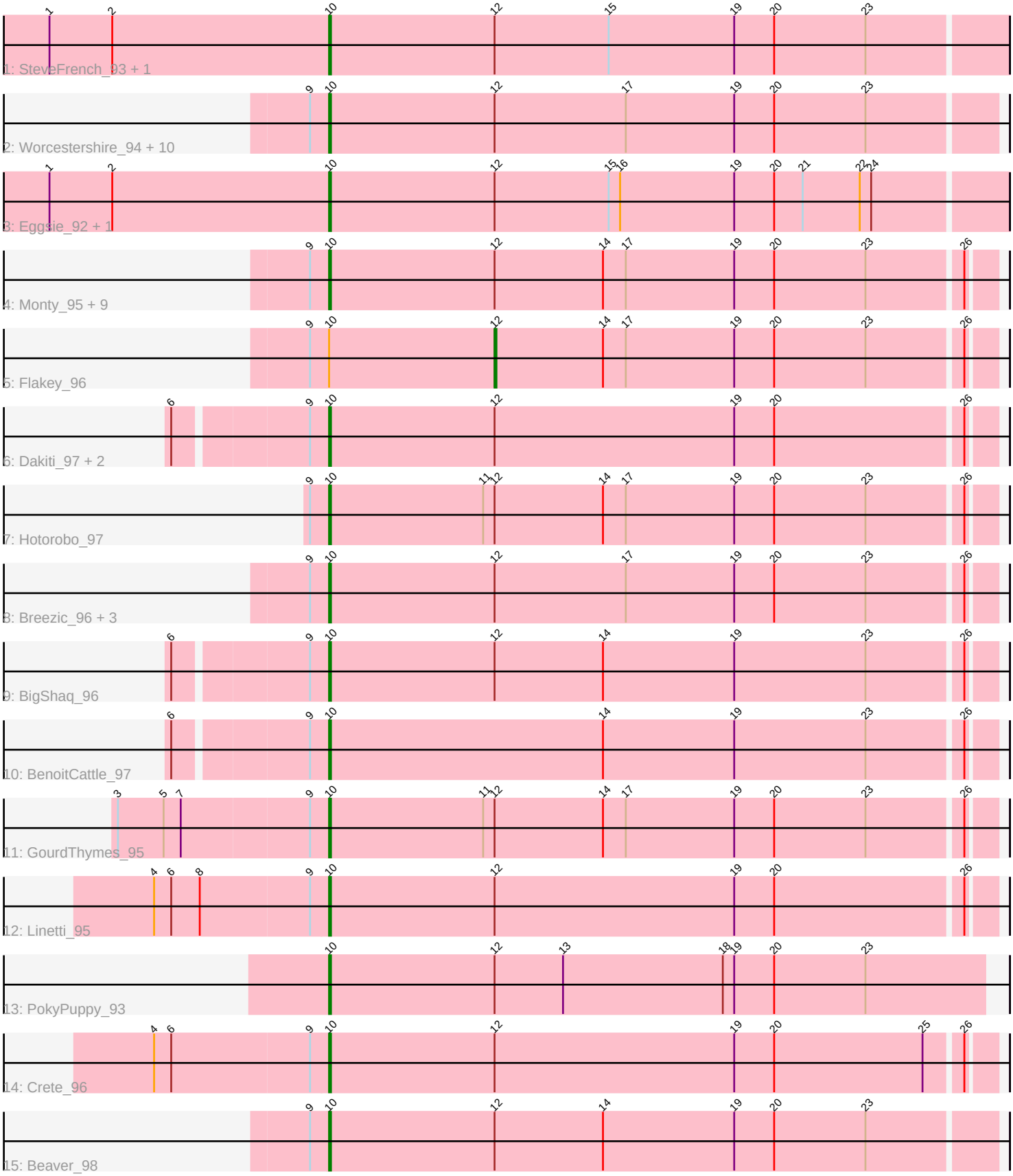
Pham 347791


1: SteveFrench_93 + 1
2: Worcestershire_94 + 10
3: Eggsie_92 + 1
4: Monty_95 + 9
5: Flakey_96
6: Dakiti_97 + 2
7: Hotorobo_97
8: Breezic_96 + 3
9: BigShaq_96
10: BenoitCattle_97
11: GourdThymes_95
12: Linetti_95
13: PokyPuppy_93
14: Crete_96
15: Beaver_98

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 347791 Report

This analysis was run 11/14/26 on database version 672.

Pham number 347791 has 41 members, 3 are drafts.

Phages represented in each track:
• Track 1 : SteveFrench_93, RoyalG_94
• Track 2 : Worcestershire_94, Adgers_98, BirksAndSocks_98, FelixAlejandro_98, Boneham_97, Poland_99, Ekhein_97, Jellybones_96, Sombrero_96, Butterball_96, Msay19_99
• Track 3 : Eggsie_92, Diabla_99
• Track 4 : Monty_95, Sam12_94, CinnamonToast_99, Exiguo_94, John316_98, CathyBurgh_95, BillyBobJr_99, Gorko_94, Barbochs_92, Lizzo_95
• Track 5 : Flakey_96
• Track 6 : Dakiti_97, Chelms_95, PierreThree_95
• Track 7 : Hotorobo_97
• Track 8 : Breezic_96, RemRem_98, Kelzog_97, Squibbles_95
• Track 9 : BigShaq_96
• Track 10 : BenoitCattle_97
• Track 11 : GourdThymes_95
• Track 12 : Linetti_95
• Track 13 : PokyPuppy_93
• Track 14 : Crete_96
• Track 15 : Beaver_98

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

The start number called the most often in the published annotations is 10, it was called in 37 of the 38 non-draft genes in the pham.

Genes that call this "Most Annotated" start:
• Adgers_98, Barbochs_92, Beaver_98, BenoitCattle_97, BigShaq_96, BillyBobJr_99, BirksAndSocks_98, Boneham_97, Breezic_96, Butterball_96, CathyBurgh_95, Chelms_95, CinnamonToast_99, Crete_96, Dakiti_97, Diabla_99, Eggsie_92, Ekhein_97, Exiguo_94, FelixAlejandro_98, Gorko_94, GourdThymes_95, Hotorobo_97, Jellybones_96, John316_98, Kelzog_97, Linetti_95, Lizzo_95, Monty_95, Msay19_99, PierreThree_95, PokyPuppy_93, Poland_99, RemRem_98, RoyalG_94, Sam12_94, Sombrero_96, Squibbles_95, SteveFrench_93, Worcestershire_94,

Genes that have the "Most Annotated" start but do not call it:
• Flakey_96,

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

Summary by start number:

Start 10:
• Found in 41 of 41 (100.0%) of genes in pham
• Manual Annotations of this start: 37 of 38
• Called 97.6% of time when present
• Phage (with cluster) where this start called: Adgers_98 (CS2), Barbochs_92 (CS2), Beaver_98 (CS2), BenoitCattle_97 (CS2), BigShaq_96 (CS2), BillyBobJr_99 (CS2), BirksAndSocks_98 (CS2), Boneham_97 (CS2), Breezic_96 (CS2), Butterball_96 (CS2), CathyBurgh_95 (CS2), Chelms_95 (CS2), CinnamonToast_99 (CS2), Crete_96 (CS2), Dakiti_97 (CS2), Diabla_99 (CS2), Eggsie_92 (CS2), Ekhein_97 (CS2), Exiguo_94 (CS2), FelixAlejandro_98 (CS2), Gorko_94 (CS2), GourdThymes_95 (CS2), Hotorobo_97 (CS2), Jellybones_96 (CS2), John316_98 (CS2), Kelzog_97 (CS2), Linetti_95 (CS2), Lizzo_95 (CS2), Monty_95 (CS2), Msay19_99 (CS2), PierreThree_95 (CS2), PokyPuppy_93 (CS2), Poland_99 (CS2), RemRem_98 (CS2), RoyalG_94 (CS2), Sam12_94 (CS2), Sombrero_96 (CS2), Squibbles_95 (CS2), SteveFrench_93 (CS2), Worcestershire_94 (CS2),

Start 12:
• Found in 40 of 41 (97.6%) of genes in pham
• Manual Annotations of this start: 1 of 38
• Called 2.5% of time when present
• Phage (with cluster) where this start called: Flakey_96 (CS2),

Summary by clusters:

There is one cluster represented in this pham: CS2

Info for manual annotations of cluster CS2:
•Start number 10 was manually annotated 37 times for cluster CS2.
•Start number 12 was manually annotated 1 time for cluster CS2.

Gene Information:

Gene: Adgers_98 Start: 70590, Stop: 70243, Start Num: 10
Candidate Starts for Adgers_98:
(9, 70599), (Start: 10 @70590 has 37 MA's), (Start: 12 @70503 has 1 MA's), (17, 70434), (19, 70377), (20, 70356), (23, 70308),

Gene: Barbochs_92 Start: 69778, Stop: 69434, Start Num: 10
Candidate Starts for Barbochs_92:
(9, 69787), (Start: 10 @69778 has 37 MA's), (Start: 12 @69691 has 1 MA's), (14, 69634), (17, 69622), (19, 69565), (20, 69544), (23, 69496), (26, 69448),

Gene: Beaver_98 Start: 71931, Stop: 71584, Start Num: 10

Candidate Starts for Beaver_98:
(9, 71940), (Start: 10 @71931 has 37 MA's), (Start: 12 @71844 has 1 MA's), (14, 71787), (19, 71718), (20, 71697), (23, 71649),

Gene: BenoitCattle_97 Start: 71326, Stop: 70982, Start Num: 10
Candidate Starts for BenoitCattle_97:
(6, 71398), (9, 71332), (Start: 10 @71326 has 37 MA's), (14, 71182), (19, 71113), (23, 71044), (26, 70996),

Gene: BigShaq_96 Start: 70925, Stop: 70581, Start Num: 10
Candidate Starts for BigShaq_96:
(6, 70997), (9, 70931), (Start: 10 @70925 has 37 MA's), (Start: 12 @70838 has 1 MA's), (14, 70781), (19, 70712), (23, 70643), (26, 70595),

Gene: BillyBobJr_99 Start: 72035, Stop: 71691, Start Num: 10
Candidate Starts for BillyBobJr_99:
(9, 72044), (Start: 10 @72035 has 37 MA's), (Start: 12 @71948 has 1 MA's), (14, 71891), (17, 71879), (19, 71822), (20, 71801), (23, 71753), (26, 71705),

Gene: BirksAndSocks_98 Start: 71545, Stop: 71198, Start Num: 10
Candidate Starts for BirksAndSocks_98:
(9, 71554), (Start: 10 @71545 has 37 MA's), (Start: 12 @71458 has 1 MA's), (17, 71389), (19, 71332), (20, 71311), (23, 71263),

Gene: Boneham_97 Start: 71470, Stop: 71123, Start Num: 10
Candidate Starts for Boneham_97:
(9, 71479), (Start: 10 @71470 has 37 MA's), (Start: 12 @71383 has 1 MA's), (17, 71314), (19, 71257), (20, 71236), (23, 71188),

Gene: Breezic_96 Start: 70479, Stop: 70135, Start Num: 10
Candidate Starts for Breezic_96:
(9, 70488), (Start: 10 @70479 has 37 MA's), (Start: 12 @70392 has 1 MA's), (17, 70323), (19, 70266), (20, 70245), (23, 70197), (26, 70149),

Gene: Butterball_96 Start: 71475, Stop: 71128, Start Num: 10
Candidate Starts for Butterball_96:
(9, 71484), (Start: 10 @71475 has 37 MA's), (Start: 12 @71388 has 1 MA's), (17, 71319), (19, 71262), (20, 71241), (23, 71193),

Gene: CathyBurgh_95 Start: 70509, Stop: 70165, Start Num: 10
Candidate Starts for CathyBurgh_95:
(9, 70518), (Start: 10 @70509 has 37 MA's), (Start: 12 @70422 has 1 MA's), (14, 70365), (17, 70353), (19, 70296), (20, 70275), (23, 70227), (26, 70179),

Gene: Chelms_95 Start: 71063, Stop: 70719, Start Num: 10
Candidate Starts for Chelms_95:
(6, 71135), (9, 71069), (Start: 10 @71063 has 37 MA's), (Start: 12 @70976 has 1 MA's), (19, 70850), (20, 70829), (26, 70733),

Gene: CinnamonToast_99 Start: 72035, Stop: 71691, Start Num: 10
Candidate Starts for CinnamonToast_99:
(9, 72044), (Start: 10 @72035 has 37 MA's), (Start: 12 @71948 has 1 MA's), (14, 71891), (17, 71879), (19, 71822), (20, 71801), (23, 71753), (26, 71705),

Gene: Crete_96 Start: 71108, Stop: 70764, Start Num: 10
Candidate Starts for Crete_96:
(4, 71195), (6, 71186), (9, 71114), (Start: 10 @71108 has 37 MA's), (Start: 12 @71021 has 1 MA's), (19, 70895), (20, 70874), (25, 70796), (26, 70778),

Gene: Dakiti_97 Start: 72006, Stop: 71662, Start Num: 10
Candidate Starts for Dakiti_97:
(6, 72078), (9, 72012), (Start: 10 @72006 has 37 MA's), (Start: 12 @71919 has 1 MA's), (19, 71793), (20, 71772), (26, 71676),

Gene: Diabla_99 Start: 71471, Stop: 71118, Start Num: 10
Candidate Starts for Diabla_99:
(1, 71618), (2, 71585), (Start: 10 @71471 has 37 MA's), (Start: 12 @71384 has 1 MA's), (15, 71324), (16, 71318), (19, 71258), (20, 71237), (21, 71222), (22, 71192), (24, 71186),

Gene: Eggsie_92 Start: 69027, Stop: 68674, Start Num: 10
Candidate Starts for Eggsie_92:
(1, 69174), (2, 69141), (Start: 10 @69027 has 37 MA's), (Start: 12 @68940 has 1 MA's), (15, 68880), (16, 68874), (19, 68814), (20, 68793), (21, 68778), (22, 68748), (24, 68742),

Gene: Ekhein_97 Start: 70526, Stop: 70179, Start Num: 10
Candidate Starts for Ekhein_97:
(9, 70535), (Start: 10 @70526 has 37 MA's), (Start: 12 @70439 has 1 MA's), (17, 70370), (19, 70313), (20, 70292), (23, 70244),

Gene: Exiguo_94 Start: 69942, Stop: 69598, Start Num: 10
Candidate Starts for Exiguo_94:
(9, 69951), (Start: 10 @69942 has 37 MA's), (Start: 12 @69855 has 1 MA's), (14, 69798), (17, 69786), (19, 69729), (20, 69708), (23, 69660), (26, 69612),

Gene: FelixAlejandro_98 Start: 71988, Stop: 71641, Start Num: 10
Candidate Starts for FelixAlejandro_98:
(9, 71997), (Start: 10 @71988 has 37 MA's), (Start: 12 @71901 has 1 MA's), (17, 71832), (19, 71775), (20, 71754), (23, 71706),

Gene: Flakey_96 Start: 71333, Stop: 71076, Start Num: 12
Candidate Starts for Flakey_96:
(9, 71429), (Start: 10 @71420 has 37 MA's), (Start: 12 @71333 has 1 MA's), (14, 71276), (17, 71264), (19, 71207), (20, 71186), (23, 71138), (26, 71090),

Gene: Gorko_94 Start: 69692, Stop: 69348, Start Num: 10
Candidate Starts for Gorko_94:
(9, 69701), (Start: 10 @69692 has 37 MA's), (Start: 12 @69605 has 1 MA's), (14, 69548), (17, 69536), (19, 69479), (20, 69458), (23, 69410), (26, 69362),

Gene: GourdThymes_95 Start: 70530, Stop: 70186, Start Num: 10
Candidate Starts for GourdThymes_95:
(3, 70638), (5, 70614), (7, 70605), (9, 70539), (Start: 10 @70530 has 37 MA's), (11, 70449), (Start: 12 @70443 has 1 MA's), (14, 70386), (17, 70374), (19, 70317), (20, 70296), (23, 70248), (26, 70200),

Gene: Hotorobo_97 Start: 71391, Stop: 71047, Start Num: 10
Candidate Starts for Hotorobo_97:

(9, 71400), (Start: 10 @71391 has 37 MA's), (11, 71310), (Start: 12 @71304 has 1 MA's), (14, 71247), (17, 71235), (19, 71178), (20, 71157), (23, 71109), (26, 71061),

Gene: Jellybones_96 Start: 71676, Stop: 71329, Start Num: 10
Candidate Starts for Jellybones_96:
(9, 71685), (Start: 10 @71676 has 37 MA's), (Start: 12 @71589 has 1 MA's), (17, 71520), (19, 71463), (20, 71442), (23, 71394),

Gene: John316_98 Start: 71650, Stop: 71306, Start Num: 10
Candidate Starts for John316_98:
(9, 71659), (Start: 10 @71650 has 37 MA's), (Start: 12 @71563 has 1 MA's), (14, 71506), (17, 71494), (19, 71437), (20, 71416), (23, 71368), (26, 71320),

Gene: Kelzog_97 Start: 70917, Stop: 70573, Start Num: 10
Candidate Starts for Kelzog_97:
(9, 70926), (Start: 10 @70917 has 37 MA's), (Start: 12 @70830 has 1 MA's), (17, 70761), (19, 70704), (20, 70683), (23, 70635), (26, 70587),

Gene: Linetti_95 Start: 72032, Stop: 71688, Start Num: 10
Candidate Starts for Linetti_95:
(4, 72119), (6, 72110), (8, 72095), (9, 72038), (Start: 10 @72032 has 37 MA's), (Start: 12 @71945 has 1 MA's), (19, 71819), (20, 71798), (26, 71702),

Gene: Lizzo_95 Start: 70509, Stop: 70165, Start Num: 10
Candidate Starts for Lizzo_95:
(9, 70518), (Start: 10 @70509 has 37 MA's), (Start: 12 @70422 has 1 MA's), (14, 70365), (17, 70353), (19, 70296), (20, 70275), (23, 70227), (26, 70179),

Gene: Monty_95 Start: 70211, Stop: 69867, Start Num: 10
Candidate Starts for Monty_95:
(9, 70220), (Start: 10 @70211 has 37 MA's), (Start: 12 @70124 has 1 MA's), (14, 70067), (17, 70055), (19, 69998), (20, 69977), (23, 69929), (26, 69881),

Gene: Msay19_99 Start: 72271, Stop: 71924, Start Num: 10
Candidate Starts for Msay19_99:
(9, 72280), (Start: 10 @72271 has 37 MA's), (Start: 12 @72184 has 1 MA's), (17, 72115), (19, 72058), (20, 72037), (23, 71989),

Gene: PierreThree_95 Start: 71637, Stop: 71293, Start Num: 10
Candidate Starts for PierreThree_95:
(6, 71709), (9, 71643), (Start: 10 @71637 has 37 MA's), (Start: 12 @71550 has 1 MA's), (19, 71424), (20, 71403), (26, 71307),

Gene: PokyPuppy_93 Start: 70913, Stop: 70569, Start Num: 10
Candidate Starts for PokyPuppy_93:
(Start: 10 @70913 has 37 MA's), (Start: 12 @70826 has 1 MA's), (13, 70790), (18, 70706), (19, 70700), (20, 70679), (23, 70631),

Gene: Poland_99 Start: 72253, Stop: 71906, Start Num: 10
Candidate Starts for Poland_99:
(9, 72262), (Start: 10 @72253 has 37 MA's), (Start: 12 @72166 has 1 MA's), (17, 72097), (19, 72040), (20, 72019), (23, 71971),

Gene: RemRem_98 Start: 70500, Stop: 70156, Start Num: 10
Candidate Starts for RemRem_98:
(9, 70509), (Start: 10 @70500 has 37 MA's), (Start: 12 @70413 has 1 MA's), (17, 70344), (19, 70287), (20, 70266), (23, 70218), (26, 70170),

Gene: RoyalG_94 Start: 70218, Stop: 69865, Start Num: 10
Candidate Starts for RoyalG_94:
(1, 70365), (2, 70332), (Start: 10 @70218 has 37 MA's), (Start: 12 @70131 has 1 MA's), (15, 70071), (19, 70005), (20, 69984), (23, 69936),

Gene: Sam12_94 Start: 69939, Stop: 69595, Start Num: 10
Candidate Starts for Sam12_94:
(9, 69948), (Start: 10 @69939 has 37 MA's), (Start: 12 @69852 has 1 MA's), (14, 69795), (17, 69783), (19, 69726), (20, 69705), (23, 69657), (26, 69609),

Gene: Sombrero_96 Start: 70555, Stop: 70208, Start Num: 10
Candidate Starts for Sombrero_96:
(9, 70564), (Start: 10 @70555 has 37 MA's), (Start: 12 @70468 has 1 MA's), (17, 70399), (19, 70342), (20, 70321), (23, 70273),

Gene: Squibbles_95 Start: 71026, Stop: 70682, Start Num: 10
Candidate Starts for Squibbles_95:
(9, 71035), (Start: 10 @71026 has 37 MA's), (Start: 12 @70939 has 1 MA's), (17, 70870), (19, 70813), (20, 70792), (23, 70744), (26, 70696),

Gene: SteveFrench_93 Start: 70458, Stop: 70105, Start Num: 10
Candidate Starts for SteveFrench_93:
(1, 70605), (2, 70572), (Start: 10 @70458 has 37 MA's), (Start: 12 @70371 has 1 MA's), (15, 70311), (19, 70245), (20, 70224), (23, 70176),

Gene: Worcestershire_94 Start: 69934, Stop: 69587, Start Num: 10
Candidate Starts for Worcestershire_94:
(9, 69943), (Start: 10 @69934 has 37 MA's), (Start: 12 @69847 has 1 MA's), (17, 69778), (19, 69721), (20, 69700), (23, 69652),