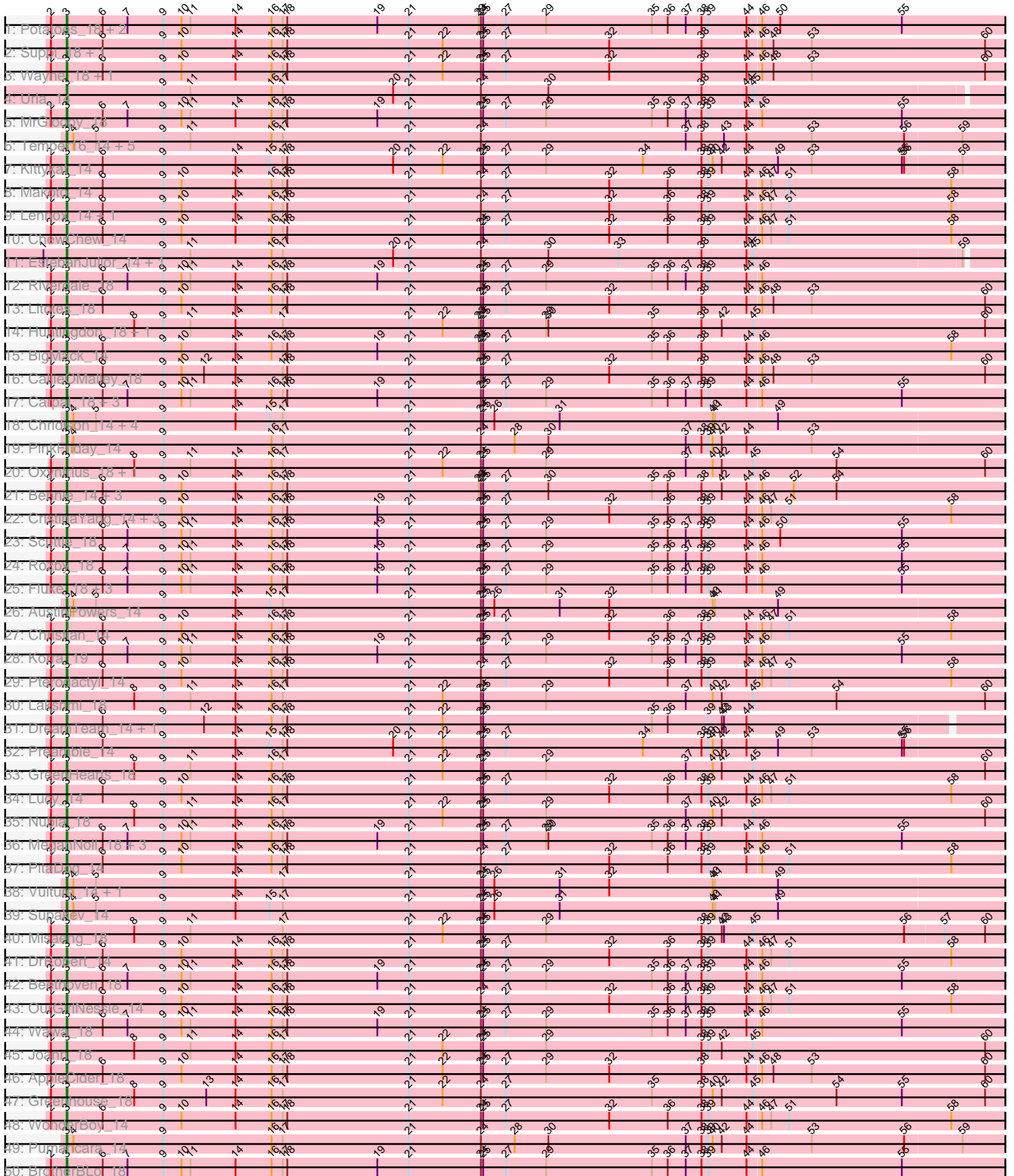


Zoomed Pham 171386



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 171386 Report

This analysis was run 07/10/24 on database version 566.

Pham number 171386 has 84 members, 2 are drafts.

Phages represented in each track:

- Track 1 : Potatoes_18, Cholula_18, Immaculata_18
- Track 2 : Suppi_18, Canowicakte_18
- Track 3 : Wayne_18, PartyCup_18
- Track 4 : Urla_14
- Track 5 : MrGloopy_18
- Track 6 : Temper16_14, Sergei_14, Maria1952_14, Daiboju_14, KingBob_14, Herb_14
- Track 7 : Kittykat_14
- Track 8 : Makoto_14
- Track 9 : Lennox_14, LilStuart_14
- Track 10 : ChewChew_14
- Track 11 : EstebanJulior_14, MamaPearl_14
- Track 12 : Riverdale_18
- Track 13 : Litotes_18
- Track 14 : Huntingdon_18, RcigaStruga_18
- Track 15 : BigMack_14
- Track 16 : CallieOMalley_18
- Track 17 : Carpal_18, Dino_18, Kalizoi_18, Zorro_18
- Track 18 : Chridison_14, Riovina_14, Eunoia_14, OMalley_14, Aledel_14
- Track 19 : PinkFriday_14
- Track 20 : Oxynfrius_18, Albanese_18
- Track 21 : Bennie_14, HeadNerd_14, Huckleberry_14, Moki_14
- Track 22 : CristinaYang_14, Lasagna_14, Bodacious_14, Nancia_14
- Track 23 : Scuttle_18
- Track 24 : Rozby_18
- Track 25 : Fluke_18, Glenn_18, TattModd_18, Savage2526_18
- Track 26 : AustinPowers_14
- Track 27 : Christian_14
- Track 28 : Korra_19
- Track 29 : Pterodactyl_14
- Track 30 : Lakshmi_18
- Track 31 : DreamTeam_14, Gisselle_14
- Track 32 : Preamble_14
- Track 33 : GreenHearts_18
- Track 34 : Lucy_14
- Track 35 : Nubia_18
- Track 36 : MeganNoll_18, Jumboset_18, RAP15_18, Vallejo_18

- Track 37 : PitaDog_14
- Track 38 : Vulture_14, HunterDalle_14
- Track 39 : Supakev_14
- Track 40 : Misaeng_18
- Track 41 : DrRobert_14
- Track 42 : Beethoven_18
- Track 43 : OurGirlNessie_14
- Track 44 : Wawa_18
- Track 45 : Joann_18
- Track 46 : AppleCider_18
- Track 47 : Greenhouse_18
- Track 48 : WonderBoy_14
- Track 49 : Pumancara_14
- Track 50 : BrotherBLo_18

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 82 of the 82 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

- Albanese_18, Aledel_14, AppleCider_18, AustinPowers_14, Beethoven_18, Bennie_14, BigMack_14, Bodacious_14, BrotherBLo_18, CallieOMalley_18, Canowicakte_18, Carpal_18, ChewChew_14, Cholula_18, Chridison_14, Christian_14, CristinaYang_14, Daiboju_14, Dino_18, DrRobert_14, DreamTeam_14, EstebanJulior_14, Eunoia_14, Fluke_18, Gisselle_14, Glenn_18, GreenHearts_18, Greenhouse_18, HeadNerd_14, Herb_14, Huckleberry_14, HunterDalle_14, Huntingdon_18, Immaculata_18, Joann_18, Jumboset_18, Kalizoi_18, KingBob_14, Kittykat_14, Korra_19, Lakshmi_18, Lasagna_14, Lennox_14, LilStuart_14, Litotes_18, Lucy_14, Makoto_14, MamaPearl_14, Maria1952_14, MeganNoll_18, Misaeng_18, Moki_14, MrGloopy_18, Nancia_14, Nubia_18, OMalley_14, OurGirlNessie_14, Oxyfrius_18, PartyCup_18, PinkFriday_14, PitaDog_14, Potatoes_18, Preamble_14, Pterodactyl_14, Pumancara_14, RAP15_18, RcigaStruga_18, Riovina_14, Riverdale_18, Rozby_18, Savage2526_18, Scuttle_18, Sergei_14, Supakev_14, Suppi_18, TattModd_18, Temper16_14, Urla_14, Vallejo_18, Vulture_14, Wawa_18, Wayne_18, WonderBoy_14, Zorro_18,

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

-

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

-

Summary by start number:

Start 3:

- Found in 84 of 84 (100.0%) of genes in pham
- Manual Annotations of this start: 82 of 82
- Called 100.0% of time when present

• Phage (with cluster) where this start called: Albanese_18 (AK), Aledel_14 (AK), AppleCider_18 (AK), AustinPowers_14 (AK), Beethoven_18 (AK), Bennie_14 (AK), BigMack_14 (AK), Bodacious_14 (AK), BrotherBLo_18 (AK), CallieOMalley_18 (AK), Canowicakte_18 (AK), Carpal_18 (AK), ChewChew_14 (AK), Cholula_18 (AK), Chridison_14 (AK), Christian_14 (AK), CristinaYang_14 (AK), Daiboju_14 (AK), Dino_18 (AK), DrRobert_14 (AK), DreamTeam_14 (AK), EstebanJulior_14 (AK), Eunoia_14 (AK), Fluke_18 (AK), Gisselle_14 (AK), Glenn_18 (AK), GreenHearts_18 (AK), Greenhouse_18 (AK), HeadNerd_14 (AK), Herb_14 (AK), Huckleberry_14 (AK), HunterDalle_14 (AK), Huntingdon_18 (AK), Immaculata_18 (AK), Joann_18 (AK), Jumboset_18 (AK), Kalizoi_18 (AK), KingBob_14 (AK), Kittykat_14 (AK), Korra_19 (AK), Lakshmi_18 (AK), Lasagna_14 (AK), Lennox_14 (AK), LilStuart_14 (AK), Litotes_18 (AK), Lucy_14 (AK), Makoto_14 (AK), MamaPearl_14 (AK), Maria1952_14 (AK), MeganNoll_18 (AK), Misaeng_18 (AK), Moki_14 (AK), MrGloopy_18 (AK), Nancia_14 (AK), Nubia_18 (AK), OMalley_14 (AK), OurGirlNessie_14 (AK), Oxynfrius_18 (AK), PartyCup_18 (AK), PinkFriday_14 (AK), PitaDog_14 (AK), Potatoes_18 (AK), Preamble_14 (AK), Pterodactyl_14 (AK), Pumancara_14 (AK), RAP15_18 (AK), RcigaStruga_18 (AK), Riovina_14 (AK), Riverdale_18 (AK), Rozby_18 (AK), Savage2526_18 (AK), Scuttle_18 (AK), Sergei_14 (AK), Supakev_14 (AK), Suppi_18 (AK), TattModd_18 (AK), Temper16_14 (AK), Urla_14 (AK), Vallejo_18 (AK), Vulture_14 (AK), Wawa_18 (AK), Wayne_18 (AK), WonderBoy_14 (AK), Zorro_18 (AK),

Summary by clusters:

There is one cluster represented in this pham: AK

Info for manual annotations of cluster AK:

•Start number 3 was manually annotated 82 times for cluster AK.

Gene Information:

Gene: Albanese_18 Start: 12660, Stop: 15221, Start Num: 3

Candidate Starts for Albanese_18:

(2, 12639), (Start: 3 @12660 has 82 MA's), (8, 12750), (9, 12789), (11, 12825), (14, 12885), (16, 12933), (17, 12948), (21, 13116), (22, 13161), (24, 13212), (25, 13215), (29, 13299), (37, 13485), (40, 13521), (42, 13533), (45, 13575), (54, 13686), (60, 13884), (66, 13977), (68, 14001), (69, 14004), (79, 14082), (80, 14088), (84, 14115), (88, 14145), (94, 14208), (98, 14223), (100, 14232), (101, 14235), (103, 14244), (105, 14268), (107, 14280), (108, 14286), (111, 14301), (112, 14307), (113, 14310), (115, 14331), (116, 14346), (118, 14361), (121, 14379), (122, 14385), (124, 14400), (126, 14409), (127, 14418), (130, 14451), (131, 14454), (133, 14466), (134, 14472), (136, 14484), (140, 14550), (141, 14565), (145, 14595), (146, 14604), (155, 14715), (159, 14751), (160, 14772), (163, 14847), (164, 14850), (167, 14904), (169, 14943), (173, 15000), (175, 15024), (179, 15066), (180, 15093), (184, 15162),

Gene: Aledel_14 Start: 9738, Stop: 12296, Start Num: 3

Candidate Starts for Aledel_14:

(Start: 3 @9738 has 82 MA's), (4, 9747), (5, 9777), (9, 9867), (14, 9963), (15, 10008), (17, 10026), (21, 10194), (24, 10290), (25, 10293), (26, 10308), (31, 10395), (40, 10599), (41, 10602), (49, 10686), (61, 10992), (66, 11052), (67, 11070), (68, 11076), (73, 11109), (74, 11121), (79, 11157), (82, 11184), (86, 11208), (87, 11214), (92, 11271), (97, 11295), (99, 11304), (103, 11319), (105, 11343), (107, 11355), (111, 11376), (112, 11382), (114, 11403), (117, 11427), (118, 11436), (121, 11454), (124, 11475),

(125, 11481), (127, 11493), (130, 11526), (131, 11529), (133, 11541), (135, 11556), (136, 11559), (142, 11646), (152, 11736), (153, 11739), (155, 11790), (160, 11847), (161, 11856), (162, 11868), (163, 11922), (164, 11925), (167, 11979), (169, 12018), (172, 12066), (173, 12075), (175, 12099), (177, 12111), (183, 12207), (184, 12237),

Gene: AppleCider_18 Start: 12612, Stop: 15167, Start Num: 3

Candidate Starts for AppleCider_18:

(2, 12591), (Start: 3 @12612 has 82 MA's), (6, 12660), (9, 12741), (10, 12765), (14, 12837), (16, 12885), (17, 12900), (18, 12906), (21, 13068), (22, 13113), (24, 13164), (25, 13167), (27, 13197), (29, 13251), (32, 13335), (38, 13458), (44, 13518), (46, 13536), (48, 13551), (53, 13602), (60, 13833), (64, 13902), (66, 13926), (67, 13944), (68, 13950), (75, 14004), (76, 14016), (80, 14037), (83, 14061), (93, 14148), (98, 14172), (99, 14178), (100, 14181), (103, 14193), (104, 14214), (105, 14217), (106, 14223), (107, 14229), (110, 14247), (111, 14250), (112, 14256), (115, 14280), (117, 14301), (118, 14310), (121, 14328), (124, 14349), (126, 14358), (127, 14367), (130, 14400), (131, 14403), (132, 14412), (133, 14415), (137, 14466), (155, 14664), (156, 14676), (158, 14697), (159, 14700), (163, 14796), (164, 14799), (167, 14853), (169, 14892), (173, 14949), (178, 14991), (180, 15039), (183, 15081), (184, 15111),

Gene: AustinPowers_14 Start: 9739, Stop: 12297, Start Num: 3

Candidate Starts for AustinPowers_14:

(Start: 3 @9739 has 82 MA's), (4, 9748), (5, 9778), (9, 9868), (14, 9964), (15, 10009), (17, 10027), (21, 10195), (24, 10291), (25, 10294), (26, 10309), (31, 10396), (32, 10462), (40, 10600), (41, 10603), (49, 10687), (61, 10993), (66, 11053), (67, 11071), (68, 11077), (73, 11110), (74, 11122), (79, 11158), (82, 11185), (86, 11209), (87, 11215), (92, 11272), (97, 11296), (99, 11305), (103, 11320), (105, 11344), (107, 11356), (111, 11377), (112, 11383), (114, 11404), (118, 11437), (121, 11455), (124, 11476), (125, 11482), (127, 11494), (130, 11527), (131, 11530), (133, 11542), (135, 11557), (136, 11560), (142, 11647), (152, 11737), (153, 11740), (155, 11791), (158, 11824), (160, 11848), (161, 11857), (163, 11923), (164, 11926), (167, 11980), (169, 12019), (172, 12067), (173, 12076), (175, 12100), (177, 12112), (183, 12208), (184, 12238),

Gene: Beethoven_18 Start: 12567, Stop: 15128, Start Num: 3

Candidate Starts for Beethoven_18:

(2, 12546), (Start: 3 @12567 has 82 MA's), (6, 12615), (7, 12648), (9, 12696), (10, 12720), (11, 12732), (14, 12792), (16, 12840), (17, 12855), (18, 12861), (19, 12981), (21, 13023), (24, 13119), (25, 13122), (27, 13152), (29, 13206), (35, 13347), (36, 13368), (37, 13392), (38, 13413), (39, 13422), (44, 13473), (46, 13491), (55, 13677), (61, 13821), (63, 13854), (66, 13881), (67, 13899), (68, 13905), (71, 13929), (73, 13938), (79, 13986), (82, 14013), (87, 14043), (88, 14049), (92, 14100), (95, 14115), (98, 14127), (99, 14133), (100, 14136), (102, 14145), (105, 14172), (107, 14184), (109, 14193), (111, 14205), (112, 14211), (114, 14232), (117, 14256), (118, 14265), (123, 14301), (124, 14304), (127, 14322), (130, 14355), (131, 14358), (132, 14367), (133, 14370), (135, 14385), (142, 14475), (155, 14619), (159, 14655), (163, 14751), (164, 14754), (167, 14808), (169, 14847), (172, 14895), (173, 14904), (175, 14928), (178, 14946), (180, 14997), (182, 15021), (183, 15039), (184, 15069),

Gene: Bennie_14 Start: 9720, Stop: 12287, Start Num: 3

Candidate Starts for Bennie_14:

(2, 9699), (Start: 3 @9720 has 82 MA's), (6, 9768), (9, 9849), (10, 9873), (14, 9945), (16, 9993), (17, 10008), (18, 10014), (21, 10176), (23, 10269), (24, 10272), (25, 10275), (27, 10305), (30, 10362), (35, 10500), (36, 10521), (38, 10566), (42, 10593), (44, 10626), (46, 10644), (52, 10686), (54, 10743), (63, 11007), (66, 11034), (67, 11052), (68, 11058), (71, 11082), (74, 11103), (79, 11139), (82, 11166), (87, 11196), (88, 11202), (92, 11253), (99, 11286), (105, 11325), (106, 11331), (107, 11337), (109, 11346), (111, 11358), (112, 11364), (115, 11388), (117, 11409), (118, 11418), (124, 11457), (127, 11475), (130, 11508), (131, 11511), (133, 11523), (135, 11538), (138, 11589), (141, 11622), (143, 11640), (147, 11664), (151, 11706), (155, 11772), (156, 11784), (160, 11829), (163, 11904), (164, 11907),

(167, 11961), (169, 12000), (171, 12027), (173, 12057), (174, 12069), (175, 12081), (176, 12090), (180, 12156), (183, 12198), (184, 12228),

Gene: BigMack_14 Start: 9716, Stop: 12277, Start Num: 3

Candidate Starts for BigMack_14:

(2, 9695), (Start: 3 @9716 has 82 MA's), (6, 9764), (9, 9845), (10, 9869), (14, 9941), (16, 9989), (17, 10004), (18, 10010), (19, 10130), (21, 10172), (23, 10265), (24, 10268), (25, 10271), (27, 10301), (35, 10496), (36, 10517), (38, 10562), (44, 10622), (46, 10640), (58, 10892), (63, 11003), (66, 11030), (67, 11048), (68, 11054), (71, 11078), (73, 11087), (79, 11135), (82, 11162), (83, 11165), (87, 11192), (88, 11198), (90, 11210), (92, 11249), (95, 11264), (98, 11276), (99, 11282), (100, 11285), (102, 11294), (105, 11321), (106, 11327), (107, 11333), (109, 11342), (111, 11354), (112, 11360), (113, 11363), (118, 11414), (123, 11450), (124, 11453), (130, 11504), (131, 11507), (132, 11516), (133, 11519), (135, 11534), (141, 11618), (154, 11726), (155, 11768), (163, 11900), (164, 11903), (167, 11957), (169, 11996), (172, 12044), (173, 12053), (175, 12077), (180, 12146), (181, 12152), (184, 12218),

Gene: Bodacious_14 Start: 9717, Stop: 12278, Start Num: 3

Candidate Starts for Bodacious_14:

(2, 9696), (Start: 3 @9717 has 82 MA's), (6, 9765), (9, 9846), (10, 9870), (14, 9942), (16, 9990), (17, 10005), (18, 10011), (19, 10131), (21, 10173), (24, 10269), (25, 10272), (27, 10302), (32, 10440), (36, 10518), (38, 10563), (39, 10572), (44, 10623), (46, 10641), (47, 10653), (51, 10677), (58, 10893), (62, 10983), (63, 11004), (66, 11031), (67, 11049), (68, 11055), (71, 11079), (73, 11088), (79, 11136), (82, 11163), (87, 11193), (92, 11250), (95, 11265), (98, 11277), (99, 11283), (100, 11286), (102, 11295), (105, 11322), (107, 11334), (109, 11343), (111, 11355), (112, 11361), (115, 11385), (117, 11406), (118, 11415), (120, 11430), (124, 11454), (130, 11505), (131, 11508), (133, 11520), (139, 11595), (142, 11625), (147, 11661), (155, 11769), (156, 11781), (159, 11805), (163, 11901), (164, 11904), (166, 11937), (167, 11958), (169, 11997), (170, 12015), (172, 12045), (173, 12054), (175, 12078), (181, 12153), (184, 12219),

Gene: BrotherBLo_18 Start: 12573, Stop: 15134, Start Num: 3

Candidate Starts for BrotherBLo_18:

(2, 12552), (Start: 3 @12573 has 82 MA's), (6, 12621), (7, 12654), (9, 12702), (10, 12726), (11, 12738), (14, 12798), (16, 12846), (17, 12861), (18, 12867), (19, 12987), (21, 13029), (24, 13125), (25, 13128), (27, 13158), (29, 13212), (35, 13353), (36, 13374), (37, 13398), (38, 13419), (39, 13428), (44, 13479), (46, 13497), (55, 13683), (61, 13827), (63, 13860), (66, 13887), (67, 13905), (68, 13911), (71, 13935), (73, 13944), (79, 13992), (82, 14019), (83, 14022), (86, 14043), (87, 14049), (88, 14055), (92, 14106), (95, 14121), (98, 14133), (99, 14139), (100, 14142), (102, 14151), (105, 14178), (107, 14190), (109, 14199), (111, 14211), (112, 14217), (114, 14238), (117, 14262), (118, 14271), (124, 14310), (127, 14328), (130, 14361), (131, 14364), (132, 14373), (133, 14376), (135, 14391), (142, 14481), (147, 14517), (155, 14625), (159, 14661), (160, 14682), (163, 14757), (164, 14760), (167, 14814), (169, 14853), (172, 14901), (173, 14910), (175, 14934), (178, 14952), (180, 15003), (182, 15027), (183, 15045), (184, 15075),

Gene: CallieOMalley_18 Start: 12612, Stop: 15167, Start Num: 3

Candidate Starts for CallieOMalley_18:

(2, 12591), (Start: 3 @12612 has 82 MA's), (6, 12660), (9, 12741), (10, 12765), (12, 12795), (14, 12837), (17, 12900), (18, 12906), (21, 13068), (24, 13164), (25, 13167), (27, 13197), (32, 13335), (38, 13458), (44, 13518), (46, 13536), (48, 13551), (53, 13602), (60, 13833), (64, 13902), (66, 13926), (67, 13944), (68, 13950), (75, 14004), (76, 14016), (80, 14037), (83, 14061), (93, 14148), (98, 14172), (99, 14178), (100, 14181), (103, 14193), (104, 14214), (105, 14217), (106, 14223), (107, 14229), (109, 14238), (110, 14247), (111, 14250), (112, 14256), (115, 14280), (117, 14301), (118, 14310), (121, 14328), (124, 14349), (126, 14358), (127, 14367), (130, 14400), (131, 14403), (132, 14412), (133, 14415), (137, 14466), (147, 14556), (155, 14664), (156, 14676), (158, 14697), (159, 14700), (163, 14796), (164, 14799), (167, 14853), (169, 14892), (173, 14949), (178, 14991), (180, 15039), (183,

15081), (184, 15111),

Gene: Canowicakte_18 Start: 12647, Stop: 15202, Start Num: 3

Candidate Starts for Canowicakte_18:

(2, 12626), (Start: 3 @12647 has 82 MA's), (6, 12695), (9, 12776), (10, 12800), (14, 12872), (16, 12920), (17, 12935), (18, 12941), (21, 13103), (22, 13148), (24, 13199), (25, 13202), (27, 13232), (32, 13370), (38, 13493), (44, 13553), (46, 13571), (48, 13586), (53, 13637), (60, 13868), (64, 13937), (66, 13961), (67, 13979), (68, 13985), (75, 14039), (76, 14051), (80, 14072), (83, 14096), (93, 14183), (98, 14207), (99, 14213), (100, 14216), (103, 14228), (104, 14249), (105, 14252), (106, 14258), (107, 14264), (109, 14273), (110, 14282), (111, 14285), (112, 14291), (115, 14315), (117, 14336), (118, 14345), (121, 14363), (124, 14384), (126, 14393), (127, 14402), (130, 14435), (131, 14438), (132, 14447), (133, 14450), (137, 14501), (147, 14591), (155, 14699), (156, 14711), (158, 14732), (159, 14735), (163, 14831), (164, 14834), (167, 14888), (169, 14927), (173, 14984), (178, 15026), (180, 15074), (183, 15116), (184, 15146),

Gene: Carpal_18 Start: 12574, Stop: 15135, Start Num: 3

Candidate Starts for Carpal_18:

(2, 12553), (Start: 3 @12574 has 82 MA's), (6, 12622), (7, 12655), (9, 12703), (10, 12727), (11, 12739), (14, 12799), (16, 12847), (17, 12862), (18, 12868), (19, 12988), (21, 13030), (24, 13126), (25, 13129), (27, 13159), (29, 13213), (35, 13354), (36, 13375), (37, 13399), (38, 13420), (39, 13429), (44, 13480), (46, 13498), (55, 13684), (61, 13828), (63, 13861), (66, 13888), (67, 13906), (68, 13912), (71, 13936), (73, 13945), (79, 13993), (82, 14020), (83, 14023), (86, 14044), (88, 14056), (92, 14107), (95, 14122), (98, 14134), (100, 14143), (102, 14152), (105, 14179), (107, 14191), (109, 14200), (111, 14212), (112, 14218), (114, 14239), (117, 14263), (118, 14272), (124, 14311), (130, 14362), (131, 14365), (132, 14374), (133, 14377), (135, 14392), (142, 14482), (147, 14518), (155, 14626), (159, 14662), (163, 14758), (164, 14761), (167, 14815), (169, 14854), (172, 14902), (173, 14911), (175, 14935), (178, 14953), (180, 15004), (182, 15028), (183, 15046), (184, 15076),

Gene: ChewChew_14 Start: 9716, Stop: 12277, Start Num: 3

Candidate Starts for ChewChew_14:

(2, 9695), (Start: 3 @9716 has 82 MA's), (6, 9764), (9, 9845), (10, 9869), (14, 9941), (16, 9989), (17, 10004), (18, 10010), (21, 10172), (24, 10268), (25, 10271), (27, 10301), (32, 10439), (36, 10517), (38, 10562), (39, 10571), (44, 10622), (46, 10640), (47, 10652), (51, 10676), (58, 10892), (62, 10982), (63, 11003), (66, 11030), (67, 11048), (68, 11054), (71, 11078), (73, 11087), (79, 11135), (82, 11162), (87, 11192), (92, 11249), (95, 11264), (98, 11276), (99, 11282), (100, 11285), (102, 11294), (105, 11321), (107, 11333), (109, 11342), (111, 11354), (112, 11360), (115, 11384), (117, 11405), (118, 11414), (120, 11429), (123, 11450), (124, 11453), (130, 11504), (131, 11507), (133, 11519), (139, 11594), (142, 11624), (147, 11660), (155, 11768), (156, 11780), (159, 11804), (163, 11900), (164, 11903), (166, 11936), (167, 11957), (169, 11996), (170, 12014), (172, 12044), (173, 12053), (175, 12077), (181, 12152), (184, 12218),

Gene: Cholula_18 Start: 12619, Stop: 15180, Start Num: 3

Candidate Starts for Cholula_18:

(2, 12598), (Start: 3 @12619 has 82 MA's), (6, 12667), (7, 12700), (9, 12748), (10, 12772), (11, 12784), (14, 12844), (16, 12892), (17, 12907), (18, 12913), (19, 13033), (21, 13075), (23, 13168), (24, 13171), (25, 13174), (27, 13204), (29, 13258), (35, 13399), (36, 13420), (37, 13444), (38, 13465), (39, 13474), (44, 13525), (46, 13543), (50, 13567), (55, 13729), (61, 13873), (63, 13906), (66, 13933), (67, 13951), (68, 13957), (71, 13981), (73, 13990), (79, 14038), (82, 14065), (86, 14089), (87, 14095), (88, 14101), (92, 14152), (95, 14167), (98, 14179), (99, 14185), (100, 14188), (102, 14197), (105, 14224), (107, 14236), (109, 14245), (111, 14257), (112, 14263), (114, 14284), (118, 14317), (124, 14356), (130, 14407), (131, 14410), (132, 14419), (133, 14422), (135, 14437), (141, 14521), (142, 14527), (147, 14563), (155, 14671), (156, 14683), (159, 14707), (163, 14803), (164, 14806), (167, 14860), (169, 14899), (172, 14947), (173, 14956), (175, 14980), (178, 14998), (180, 15049), (182, 15073),

(183, 15091), (184, 15121),

Gene: Chridison_14 Start: 9739, Stop: 12297, Start Num: 3

Candidate Starts for Chridison_14:

(Start: 3 @9739 has 82 MA's), (4, 9748), (5, 9778), (9, 9868), (14, 9964), (15, 10009), (17, 10027), (21, 10195), (24, 10291), (25, 10294), (26, 10309), (31, 10396), (40, 10600), (41, 10603), (49, 10687), (61, 10993), (66, 11053), (67, 11071), (68, 11077), (73, 11110), (74, 11122), (79, 11158), (82, 11185), (86, 11209), (87, 11215), (92, 11272), (97, 11296), (99, 11305), (103, 11320), (105, 11344), (107, 11356), (111, 11377), (112, 11383), (114, 11404), (117, 11428), (118, 11437), (121, 11455), (124, 11476), (125, 11482), (127, 11494), (130, 11527), (131, 11530), (133, 11542), (135, 11557), (136, 11560), (142, 11647), (152, 11737), (153, 11740), (155, 11791), (160, 11848), (161, 11857), (162, 11869), (163, 11923), (164, 11926), (167, 11980), (169, 12019), (172, 12067), (173, 12076), (175, 12100), (177, 12112), (183, 12208), (184, 12238),

Gene: Christian_14 Start: 9717, Stop: 12278, Start Num: 3

Candidate Starts for Christian_14:

(2, 9696), (Start: 3 @9717 has 82 MA's), (6, 9765), (9, 9846), (10, 9870), (14, 9942), (16, 9990), (17, 10005), (18, 10011), (21, 10173), (24, 10269), (25, 10272), (27, 10302), (32, 10440), (36, 10518), (38, 10563), (39, 10572), (44, 10623), (46, 10641), (47, 10653), (51, 10677), (58, 10893), (62, 10983), (63, 11004), (66, 11031), (67, 11049), (68, 11055), (71, 11079), (73, 11088), (79, 11136), (82, 11163), (87, 11193), (92, 11250), (99, 11283), (102, 11295), (105, 11322), (106, 11328), (107, 11334), (109, 11343), (111, 11355), (112, 11361), (115, 11385), (117, 11406), (118, 11415), (120, 11430), (124, 11454), (130, 11505), (131, 11508), (133, 11520), (139, 11595), (142, 11625), (147, 11661), (155, 11769), (156, 11781), (159, 11805), (163, 11901), (164, 11904), (166, 11937), (167, 11958), (169, 11997), (170, 12015), (172, 12045), (173, 12054), (175, 12078), (181, 12153), (184, 12219),

Gene: CristinaYang_14 Start: 9717, Stop: 12278, Start Num: 3

Candidate Starts for CristinaYang_14:

(2, 9696), (Start: 3 @9717 has 82 MA's), (6, 9765), (9, 9846), (10, 9870), (14, 9942), (16, 9990), (17, 10005), (18, 10011), (19, 10131), (21, 10173), (24, 10269), (25, 10272), (27, 10302), (32, 10440), (36, 10518), (38, 10563), (39, 10572), (44, 10623), (46, 10641), (47, 10653), (51, 10677), (58, 10893), (62, 10983), (63, 11004), (66, 11031), (67, 11049), (68, 11055), (71, 11079), (73, 11088), (79, 11136), (82, 11163), (87, 11193), (92, 11250), (95, 11265), (98, 11277), (99, 11283), (100, 11286), (102, 11295), (105, 11322), (107, 11334), (109, 11343), (111, 11355), (112, 11361), (115, 11385), (117, 11406), (118, 11415), (120, 11430), (124, 11454), (130, 11505), (131, 11508), (133, 11520), (139, 11595), (142, 11625), (147, 11661), (155, 11769), (156, 11781), (159, 11805), (163, 11901), (164, 11904), (166, 11937), (167, 11958), (169, 11997), (170, 12015), (172, 12045), (173, 12054), (175, 12078), (181, 12153), (184, 12219),

Gene: Daiboju_14 Start: 9744, Stop: 12302, Start Num: 3

Candidate Starts for Daiboju_14:

(Start: 3 @9744 has 82 MA's), (4, 9753), (5, 9783), (9, 9873), (11, 9909), (16, 10017), (17, 10032), (21, 10200), (24, 10296), (37, 10569), (38, 10590), (43, 10620), (44, 10650), (53, 10737), (56, 10860), (59, 10935), (61, 10998), (63, 11031), (65, 11052), (66, 11058), (67, 11076), (68, 11082), (71, 11106), (76, 11148), (79, 11163), (80, 11169), (84, 11196), (91, 11247), (93, 11280), (94, 11289), (99, 11310), (102, 11322), (105, 11349), (107, 11361), (109, 11370), (111, 11382), (112, 11388), (113, 11391), (115, 11412), (118, 11442), (121, 11460), (124, 11481), (126, 11490), (127, 11499), (130, 11532), (131, 11535), (133, 11547), (135, 11562), (141, 11646), (142, 11652), (147, 11688), (153, 11745), (154, 11754), (155, 11796), (160, 11853), (163, 11928), (164, 11931), (165, 11961), (167, 11985), (170, 12042), (172, 12072), (173, 12081), (175, 12105), (177, 12117), (184, 12243),

Gene: Dino_18 Start: 12572, Stop: 15133, Start Num: 3

Candidate Starts for Dino_18:

(2, 12551), (Start: 3 @12572 has 82 MA's), (6, 12620), (7, 12653), (9, 12701), (10, 12725), (11, 12737), (14, 12797), (16, 12845), (17, 12860), (18, 12866), (19, 12986), (21, 13028), (24, 13124), (25, 13127), (27, 13157), (29, 13211), (35, 13352), (36, 13373), (37, 13397), (38, 13418), (39, 13427), (44, 13478), (46, 13496), (55, 13682), (61, 13826), (63, 13859), (66, 13886), (67, 13904), (68, 13910), (71, 13934), (73, 13943), (79, 13991), (82, 14018), (83, 14021), (86, 14042), (88, 14054), (92, 14105), (95, 14120), (98, 14132), (100, 14141), (102, 14150), (105, 14177), (107, 14189), (109, 14198), (111, 14210), (112, 14216), (114, 14237), (117, 14261), (118, 14270), (124, 14309), (130, 14360), (131, 14363), (132, 14372), (133, 14375), (135, 14390), (142, 14480), (147, 14516), (155, 14624), (159, 14660), (163, 14756), (164, 14759), (167, 14813), (169, 14852), (172, 14900), (173, 14909), (175, 14933), (178, 14951), (180, 15002), (182, 15026), (183, 15044), (184, 15074),

Gene: DrRobert_14 Start: 9717, Stop: 12278, Start Num: 3

Candidate Starts for DrRobert_14:

(2, 9696), (Start: 3 @9717 has 82 MA's), (6, 9765), (9, 9846), (10, 9870), (14, 9942), (16, 9990), (17, 10005), (18, 10011), (21, 10173), (24, 10269), (25, 10272), (27, 10302), (32, 10440), (36, 10518), (38, 10563), (39, 10572), (44, 10623), (46, 10641), (47, 10653), (51, 10677), (58, 10893), (62, 10983), (63, 11004), (66, 11031), (67, 11049), (71, 11079), (73, 11088), (79, 11136), (82, 11163), (87, 11193), (92, 11250), (95, 11265), (98, 11277), (99, 11283), (100, 11286), (102, 11295), (105, 11322), (107, 11334), (109, 11343), (111, 11355), (112, 11361), (115, 11385), (117, 11406), (118, 11415), (120, 11430), (124, 11454), (130, 11505), (131, 11508), (133, 11520), (139, 11595), (142, 11625), (147, 11661), (155, 11769), (156, 11781), (158, 11802), (159, 11805), (163, 11901), (164, 11904), (166, 11937), (167, 11958), (170, 12015), (172, 12045), (173, 12054), (175, 12078), (181, 12153), (184, 12219),

Gene: DreamTeam_14 Start: 9784, Stop: 12330, Start Num: 3

Candidate Starts for DreamTeam_14:

(2, 9763), (Start: 3 @9784 has 82 MA's), (6, 9832), (9, 9913), (12, 9967), (14, 10009), (16, 10057), (17, 10072), (18, 10078), (21, 10240), (22, 10285), (24, 10336), (25, 10339), (35, 10564), (36, 10585), (39, 10639), (42, 10657), (43, 10660), (44, 10690), (61, 11026), (65, 11080), (66, 11086), (67, 11104), (68, 11110), (74, 11155), (78, 11188), (79, 11191), (85, 11239), (86, 11242), (88, 11254), (89, 11263), (93, 11308), (94, 11317), (99, 11338), (102, 11350), (103, 11353), (105, 11377), (106, 11383), (107, 11389), (111, 11410), (112, 11416), (114, 11437), (117, 11461), (118, 11470), (121, 11488), (124, 11509), (125, 11515), (130, 11560), (131, 11563), (132, 11572), (133, 11575), (141, 11674), (142, 11680), (149, 11734), (155, 11824), (163, 11956), (164, 11959), (167, 12013), (169, 12052), (170, 12070), (172, 12100), (173, 12109), (178, 12151), (184, 12271),

Gene: EstebanJulior_14 Start: 9752, Stop: 12301, Start Num: 3

Candidate Starts for EstebanJulior_14:

(1, 9722), (Start: 3 @9752 has 82 MA's), (9, 9881), (11, 9917), (16, 10025), (17, 10040), (20, 10187), (21, 10208), (24, 10304), (30, 10394), (33, 10487), (38, 10598), (44, 10658), (45, 10667), (59, 10940), (61, 10994), (63, 11027), (65, 11048), (66, 11054), (67, 11072), (79, 11159), (88, 11222), (93, 11276), (94, 11285), (99, 11306), (102, 11318), (103, 11321), (105, 11345), (106, 11351), (107, 11357), (109, 11366), (111, 11378), (112, 11384), (114, 11405), (118, 11438), (120, 11453), (121, 11456), (124, 11477), (125, 11483), (127, 11495), (130, 11528), (131, 11531), (132, 11540), (133, 11543), (135, 11558), (141, 11642), (146, 11681), (155, 11792), (156, 11804), (160, 11849), (163, 11924), (164, 11927), (167, 11981), (172, 12068), (173, 12077), (175, 12101), (177, 12113), (180, 12170), (181, 12176), (184, 12242), (185, 12284),

Gene: Eunoia_14 Start: 9738, Stop: 12296, Start Num: 3

Candidate Starts for Eunoia_14:

(Start: 3 @9738 has 82 MA's), (4, 9747), (5, 9777), (9, 9867), (14, 9963), (15, 10008), (17, 10026), (21, 10194), (24, 10290), (25, 10293), (26, 10308), (31, 10395), (40, 10599), (41, 10602), (49, 10686), (61, 10992), (66, 11052), (67, 11070), (68, 11076), (73, 11109), (74, 11121), (79, 11157), (82, 11184), (86, 11208), (87, 11214), (92, 11271), (97, 11295), (99, 11304), (103, 11319), (105, 11343), (107, 11355),

(111, 11376), (112, 11382), (114, 11403), (117, 11427), (118, 11436), (121, 11454), (124, 11475), (125, 11481), (127, 11493), (130, 11526), (131, 11529), (133, 11541), (135, 11556), (136, 11559), (142, 11646), (152, 11736), (153, 11739), (155, 11790), (160, 11847), (161, 11856), (162, 11868), (163, 11922), (164, 11925), (167, 11979), (169, 12018), (172, 12066), (173, 12075), (175, 12099), (177, 12111), (183, 12207), (184, 12237),

Gene: Fluke_18 Start: 12615, Stop: 15176, Start Num: 3

Candidate Starts for Fluke_18:

(2, 12594), (Start: 3 @12615 has 82 MA's), (6, 12663), (7, 12696), (9, 12744), (10, 12768), (11, 12780), (14, 12840), (16, 12888), (17, 12903), (18, 12909), (19, 13029), (21, 13071), (24, 13167), (25, 13170), (27, 13200), (29, 13254), (35, 13395), (36, 13416), (37, 13440), (38, 13461), (39, 13470), (44, 13521), (46, 13539), (55, 13725), (61, 13869), (63, 13902), (66, 13929), (67, 13947), (68, 13953), (71, 13977), (73, 13986), (79, 14034), (82, 14061), (87, 14091), (88, 14097), (92, 14148), (95, 14163), (98, 14175), (99, 14181), (100, 14184), (102, 14193), (105, 14220), (107, 14232), (109, 14241), (111, 14253), (112, 14259), (114, 14280), (117, 14304), (118, 14313), (124, 14352), (127, 14370), (130, 14403), (131, 14406), (132, 14415), (133, 14418), (135, 14433), (142, 14523), (147, 14559), (155, 14667), (159, 14703), (163, 14799), (164, 14802), (167, 14856), (169, 14895), (172, 14943), (173, 14952), (175, 14976), (178, 14994), (180, 15045), (182, 15069), (183, 15087), (184, 15117),

Gene: Gisselle_14 Start: 9784, Stop: 12330, Start Num: 3

Candidate Starts for Gisselle_14:

(2, 9763), (Start: 3 @9784 has 82 MA's), (6, 9832), (9, 9913), (12, 9967), (14, 10009), (16, 10057), (17, 10072), (18, 10078), (21, 10240), (22, 10285), (24, 10336), (25, 10339), (35, 10564), (36, 10585), (39, 10639), (42, 10657), (43, 10660), (44, 10690), (61, 11026), (65, 11080), (66, 11086), (67, 11104), (68, 11110), (74, 11155), (78, 11188), (79, 11191), (85, 11239), (86, 11242), (88, 11254), (89, 11263), (93, 11308), (94, 11317), (99, 11338), (102, 11350), (103, 11353), (105, 11377), (106, 11383), (107, 11389), (111, 11410), (112, 11416), (114, 11437), (117, 11461), (118, 11470), (121, 11488), (124, 11509), (125, 11515), (130, 11560), (131, 11563), (132, 11572), (133, 11575), (141, 11674), (142, 11680), (149, 11734), (155, 11824), (163, 11956), (164, 11959), (167, 12013), (169, 12052), (170, 12070), (172, 12100), (173, 12109), (178, 12151), (184, 12271),

Gene: Glenn_18 Start: 12624, Stop: 15185, Start Num: 3

Candidate Starts for Glenn_18:

(2, 12603), (Start: 3 @12624 has 82 MA's), (6, 12672), (7, 12705), (9, 12753), (10, 12777), (11, 12789), (14, 12849), (16, 12897), (17, 12912), (18, 12918), (19, 13038), (21, 13080), (24, 13176), (25, 13179), (27, 13209), (29, 13263), (35, 13404), (36, 13425), (37, 13449), (38, 13470), (39, 13479), (44, 13530), (46, 13548), (55, 13734), (61, 13878), (63, 13911), (66, 13938), (67, 13956), (68, 13962), (71, 13986), (73, 13995), (79, 14043), (82, 14070), (87, 14100), (88, 14106), (92, 14157), (95, 14172), (98, 14184), (99, 14190), (100, 14193), (102, 14202), (105, 14229), (107, 14241), (109, 14250), (111, 14262), (112, 14268), (114, 14289), (117, 14313), (118, 14322), (124, 14361), (127, 14379), (130, 14412), (131, 14415), (132, 14424), (133, 14427), (135, 14442), (142, 14532), (147, 14568), (155, 14676), (159, 14712), (163, 14808), (164, 14811), (167, 14865), (169, 14904), (172, 14952), (173, 14961), (175, 14985), (178, 15003), (180, 15054), (182, 15078), (183, 15096), (184, 15126),

Gene: GreenHearts_18 Start: 12707, Stop: 15268, Start Num: 3

Candidate Starts for GreenHearts_18:

(2, 12686), (Start: 3 @12707 has 82 MA's), (8, 12797), (9, 12836), (11, 12872), (14, 12932), (16, 12980), (17, 12995), (21, 13163), (22, 13208), (24, 13259), (25, 13262), (29, 13346), (37, 13532), (40, 13568), (42, 13580), (45, 13622), (60, 13931), (66, 14024), (67, 14042), (68, 14048), (79, 14129), (80, 14135), (84, 14162), (88, 14192), (94, 14255), (98, 14270), (100, 14279), (101, 14282), (103, 14291), (105, 14315), (107, 14327), (108, 14333), (111, 14348), (112, 14354), (113, 14357), (115, 14378), (116, 14393), (118, 14408), (121, 14426), (122, 14432), (124, 14447), (126, 14456), (127, 14465), (130, 14498), (131, 14501), (133, 14513), (134, 14519), (136, 14531), (140, 14597), (141, 14612),

(145, 14642), (146, 14651), (155, 14762), (159, 14798), (160, 14819), (163, 14894), (164, 14897), (167, 14951), (169, 14990), (173, 15047), (175, 15071), (179, 15113), (180, 15140), (184, 15209),

Gene: Greenhouse_18 Start: 12631, Stop: 15192, Start Num: 3

Candidate Starts for Greenhouse_18:

(2, 12610), (Start: 3 @12631 has 82 MA's), (8, 12721), (9, 12760), (13, 12817), (14, 12856), (16, 12904), (17, 12919), (21, 13087), (22, 13132), (24, 13183), (27, 13216), (35, 13411), (38, 13477), (40, 13492), (42, 13504), (45, 13546), (54, 13657), (55, 13744), (60, 13855), (61, 13888), (66, 13948), (68, 13972), (69, 13975), (79, 14053), (80, 14059), (81, 14062), (84, 14086), (88, 14116), (94, 14179), (98, 14194), (99, 14200), (100, 14203), (103, 14215), (105, 14239), (107, 14251), (108, 14257), (111, 14272), (112, 14278), (113, 14281), (115, 14302), (116, 14317), (118, 14332), (121, 14350), (122, 14356), (124, 14371), (126, 14380), (130, 14422), (131, 14425), (133, 14437), (134, 14443), (136, 14455), (138, 14503), (140, 14521), (141, 14536), (145, 14566), (146, 14575), (155, 14686), (159, 14722), (160, 14743), (163, 14818), (164, 14821), (167, 14875), (169, 14914), (173, 14971), (175, 14995), (179, 15037), (180, 15064), (184, 15133),

Gene: HeadNerd_14 Start: 9720, Stop: 12287, Start Num: 3

Candidate Starts for HeadNerd_14:

(2, 9699), (Start: 3 @9720 has 82 MA's), (6, 9768), (9, 9849), (10, 9873), (14, 9945), (16, 9993), (17, 10008), (18, 10014), (21, 10176), (23, 10269), (24, 10272), (25, 10275), (27, 10305), (30, 10362), (35, 10500), (36, 10521), (38, 10566), (42, 10593), (44, 10626), (46, 10644), (52, 10686), (54, 10743), (63, 11007), (66, 11034), (67, 11052), (68, 11058), (71, 11082), (74, 11103), (79, 11139), (82, 11166), (87, 11196), (88, 11202), (92, 11253), (99, 11286), (105, 11325), (106, 11331), (107, 11337), (109, 11346), (111, 11358), (112, 11364), (115, 11388), (117, 11409), (118, 11418), (124, 11457), (127, 11475), (130, 11508), (131, 11511), (133, 11523), (135, 11538), (138, 11589), (141, 11622), (143, 11640), (147, 11664), (151, 11706), (155, 11772), (156, 11784), (160, 11829), (163, 11904), (164, 11907), (167, 11961), (169, 12000), (171, 12027), (173, 12057), (174, 12069), (175, 12081), (176, 12090), (180, 12156), (183, 12198), (184, 12228),

Gene: Herb_14 Start: 9744, Stop: 12302, Start Num: 3

Candidate Starts for Herb_14:

(Start: 3 @9744 has 82 MA's), (4, 9753), (5, 9783), (9, 9873), (11, 9909), (16, 10017), (17, 10032), (21, 10200), (24, 10296), (37, 10569), (38, 10590), (43, 10620), (44, 10650), (53, 10737), (56, 10860), (59, 10935), (61, 10998), (63, 11031), (65, 11052), (66, 11058), (67, 11076), (68, 11082), (71, 11106), (76, 11148), (79, 11163), (80, 11169), (84, 11196), (91, 11247), (93, 11280), (94, 11289), (99, 11310), (102, 11322), (105, 11349), (107, 11361), (109, 11370), (111, 11382), (112, 11388), (113, 11391), (115, 11412), (118, 11442), (121, 11460), (124, 11481), (126, 11490), (127, 11499), (130, 11532), (131, 11535), (133, 11547), (135, 11562), (141, 11646), (142, 11652), (147, 11688), (153, 11745), (154, 11754), (155, 11796), (160, 11853), (163, 11928), (164, 11931), (165, 11961), (167, 11985), (170, 12042), (172, 12072), (173, 12081), (175, 12105), (177, 12117), (184, 12243),

Gene: Huckleberry_14 Start: 9720, Stop: 12287, Start Num: 3

Candidate Starts for Huckleberry_14:

(2, 9699), (Start: 3 @9720 has 82 MA's), (6, 9768), (9, 9849), (10, 9873), (14, 9945), (16, 9993), (17, 10008), (18, 10014), (21, 10176), (23, 10269), (24, 10272), (25, 10275), (27, 10305), (30, 10362), (35, 10500), (36, 10521), (38, 10566), (42, 10593), (44, 10626), (46, 10644), (52, 10686), (54, 10743), (63, 11007), (66, 11034), (67, 11052), (68, 11058), (71, 11082), (74, 11103), (79, 11139), (82, 11166), (87, 11196), (88, 11202), (92, 11253), (99, 11286), (105, 11325), (106, 11331), (107, 11337), (109, 11346), (111, 11358), (112, 11364), (115, 11388), (117, 11409), (118, 11418), (124, 11457), (127, 11475), (130, 11508), (131, 11511), (133, 11523), (135, 11538), (138, 11589), (141, 11622), (143, 11640), (147, 11664), (151, 11706), (155, 11772), (156, 11784), (160, 11829), (163, 11904), (164, 11907), (167, 11961), (169, 12000), (171, 12027), (173, 12057), (174, 12069), (175, 12081), (176, 12090), (180, 12156), (183, 12198), (184, 12228),

Gene: HunterDalle_14 Start: 9738, Stop: 12296, Start Num: 3

Candidate Starts for HunterDalle_14:

(Start: 3 @9738 has 82 MA's), (4, 9747), (5, 9777), (9, 9867), (14, 9963), (17, 10026), (21, 10194), (24, 10290), (25, 10293), (26, 10308), (31, 10395), (32, 10461), (40, 10599), (41, 10602), (49, 10686), (61, 10992), (66, 11052), (67, 11070), (68, 11076), (73, 11109), (74, 11121), (79, 11157), (82, 11184), (86, 11208), (87, 11214), (92, 11271), (97, 11295), (99, 11304), (103, 11319), (105, 11343), (107, 11355), (111, 11376), (112, 11382), (114, 11403), (117, 11427), (118, 11436), (121, 11454), (124, 11475), (125, 11481), (127, 11493), (130, 11526), (131, 11529), (133, 11541), (135, 11556), (136, 11559), (142, 11646), (152, 11736), (153, 11739), (155, 11790), (160, 11847), (161, 11856), (162, 11868), (163, 11922), (164, 11925), (167, 11979), (169, 12018), (172, 12066), (173, 12075), (175, 12099), (177, 12111), (183, 12207), (184, 12237),

Gene: Huntingdon_18 Start: 12617, Stop: 15178, Start Num: 3

Candidate Starts for Huntingdon_18:

(2, 12596), (Start: 3 @12617 has 82 MA's), (8, 12707), (9, 12746), (11, 12782), (14, 12842), (17, 12905), (21, 13073), (22, 13118), (23, 13166), (24, 13169), (25, 13172), (29, 13256), (30, 13259), (35, 13397), (38, 13463), (42, 13490), (45, 13532), (60, 13841), (61, 13874), (66, 13934), (68, 13958), (79, 14039), (80, 14045), (81, 14048), (84, 14072), (88, 14102), (91, 14123), (96, 14171), (99, 14186), (103, 14201), (105, 14225), (107, 14237), (108, 14243), (111, 14258), (112, 14264), (116, 14303), (117, 14309), (118, 14318), (121, 14336), (122, 14342), (123, 14354), (124, 14357), (126, 14366), (128, 14384), (130, 14408), (131, 14411), (133, 14423), (136, 14441), (140, 14507), (141, 14522), (145, 14552), (146, 14561), (153, 14621), (155, 14672), (159, 14708), (163, 14804), (164, 14807), (167, 14861), (169, 14900), (171, 14927), (173, 14957), (175, 14981), (179, 15023), (180, 15050), (184, 15119),

Gene: Immaculata_18 Start: 12618, Stop: 15179, Start Num: 3

Candidate Starts for Immaculata_18:

(2, 12597), (Start: 3 @12618 has 82 MA's), (6, 12666), (7, 12699), (9, 12747), (10, 12771), (11, 12783), (14, 12843), (16, 12891), (17, 12906), (18, 12912), (19, 13032), (21, 13074), (23, 13167), (24, 13170), (25, 13173), (27, 13203), (29, 13257), (35, 13398), (36, 13419), (37, 13443), (38, 13464), (39, 13473), (44, 13524), (46, 13542), (50, 13566), (55, 13728), (61, 13872), (63, 13905), (66, 13932), (67, 13950), (68, 13956), (71, 13980), (73, 13989), (79, 14037), (82, 14064), (86, 14088), (87, 14094), (88, 14100), (92, 14151), (95, 14166), (98, 14178), (99, 14184), (100, 14187), (102, 14196), (105, 14223), (107, 14235), (109, 14244), (111, 14256), (112, 14262), (114, 14283), (118, 14316), (124, 14355), (130, 14406), (131, 14409), (132, 14418), (133, 14421), (135, 14436), (141, 14520), (142, 14526), (147, 14562), (155, 14670), (156, 14682), (159, 14706), (163, 14802), (164, 14805), (167, 14859), (169, 14898), (172, 14946), (173, 14955), (175, 14979), (178, 14997), (180, 15048), (182, 15072), (183, 15090), (184, 15120),

Gene: Joann_18 Start: 12611, Stop: 15172, Start Num: 3

Candidate Starts for Joann_18:

(2, 12590), (Start: 3 @12611 has 82 MA's), (8, 12701), (9, 12740), (11, 12776), (14, 12836), (16, 12884), (17, 12899), (21, 13067), (22, 13112), (24, 13163), (25, 13166), (29, 13250), (38, 13457), (39, 13466), (42, 13484), (45, 13526), (60, 13835), (61, 13868), (66, 13928), (68, 13952), (79, 14033), (80, 14039), (81, 14042), (84, 14066), (88, 14096), (91, 14117), (99, 14180), (103, 14195), (105, 14219), (107, 14231), (108, 14237), (111, 14252), (112, 14258), (113, 14261), (115, 14282), (116, 14297), (118, 14312), (121, 14330), (122, 14336), (124, 14351), (126, 14360), (127, 14369), (130, 14402), (131, 14405), (133, 14417), (134, 14423), (136, 14435), (140, 14501), (141, 14516), (153, 14615), (155, 14666), (156, 14678), (158, 14699), (163, 14798), (164, 14801), (167, 14855), (169, 14894), (173, 14951), (175, 14975), (179, 15017), (180, 15044), (184, 15113),

Gene: Jumboset_18 Start: 12567, Stop: 15128, Start Num: 3

Candidate Starts for Jumboset_18:

(2, 12546), (Start: 3 @12567 has 82 MA's), (6, 12615), (7, 12648), (9, 12696), (10, 12720), (11, 12732), (14, 12792), (16, 12840), (17, 12855), (18, 12861), (19, 12981), (21, 13023), (24, 13119), (25, 13122), (27, 13152), (29, 13206), (30, 13209), (35, 13347), (36, 13368), (37, 13392), (38, 13413), (39, 13422), (44, 13473), (46, 13491), (55, 13677), (61, 13821), (63, 13854), (66, 13881), (67, 13899), (68, 13905), (71, 13929), (73, 13938), (79, 13986), (82, 14013), (83, 14016), (86, 14037), (87, 14043), (88, 14049), (92, 14100), (95, 14115), (98, 14127), (99, 14133), (100, 14136), (102, 14145), (105, 14172), (107, 14184), (109, 14193), (111, 14205), (112, 14211), (114, 14232), (118, 14265), (124, 14304), (130, 14355), (131, 14358), (132, 14367), (133, 14370), (135, 14385), (142, 14475), (147, 14511), (155, 14619), (159, 14655), (163, 14751), (164, 14754), (167, 14808), (169, 14847), (172, 14895), (173, 14904), (175, 14928), (178, 14946), (180, 14997), (182, 15021), (183, 15039), (184, 15069),

Gene: Kalizoi_18 Start: 12566, Stop: 15127, Start Num: 3

Candidate Starts for Kalizoi_18:

(2, 12545), (Start: 3 @12566 has 82 MA's), (6, 12614), (7, 12647), (9, 12695), (10, 12719), (11, 12731), (14, 12791), (16, 12839), (17, 12854), (18, 12860), (19, 12980), (21, 13022), (24, 13118), (25, 13121), (27, 13151), (29, 13205), (35, 13346), (36, 13367), (37, 13391), (38, 13412), (39, 13421), (44, 13472), (46, 13490), (55, 13676), (61, 13820), (63, 13853), (66, 13880), (67, 13898), (68, 13904), (71, 13928), (73, 13937), (79, 13985), (82, 14012), (83, 14015), (86, 14036), (88, 14048), (92, 14099), (95, 14114), (98, 14126), (100, 14135), (102, 14144), (105, 14171), (107, 14183), (109, 14192), (111, 14204), (112, 14210), (114, 14231), (117, 14255), (118, 14264), (124, 14303), (130, 14354), (131, 14357), (132, 14366), (133, 14369), (135, 14384), (142, 14474), (147, 14510), (155, 14618), (159, 14654), (163, 14750), (164, 14753), (167, 14807), (169, 14846), (172, 14894), (173, 14903), (175, 14927), (178, 14945), (180, 14996), (182, 15020), (183, 15038), (184, 15068),

Gene: KingBob_14 Start: 9744, Stop: 12302, Start Num: 3

Candidate Starts for KingBob_14:

(Start: 3 @9744 has 82 MA's), (4, 9753), (5, 9783), (9, 9873), (11, 9909), (16, 10017), (17, 10032), (21, 10200), (24, 10296), (37, 10569), (38, 10590), (43, 10620), (44, 10650), (53, 10737), (56, 10860), (59, 10935), (61, 10998), (63, 11031), (65, 11052), (66, 11058), (67, 11076), (68, 11082), (71, 11106), (76, 11148), (79, 11163), (80, 11169), (84, 11196), (91, 11247), (93, 11280), (94, 11289), (99, 11310), (102, 11322), (105, 11349), (107, 11361), (109, 11370), (111, 11382), (112, 11388), (113, 11391), (115, 11412), (118, 11442), (121, 11460), (124, 11481), (126, 11490), (127, 11499), (130, 11532), (131, 11535), (133, 11547), (135, 11562), (141, 11646), (142, 11652), (147, 11688), (153, 11745), (154, 11754), (155, 11796), (160, 11853), (163, 11928), (164, 11931), (165, 11961), (167, 11985), (170, 12042), (172, 12072), (173, 12081), (175, 12105), (177, 12117), (184, 12243),

Gene: Kittykat_14 Start: 9756, Stop: 12314, Start Num: 3

Candidate Starts for Kittykat_14:

(2, 9735), (Start: 3 @9756 has 82 MA's), (6, 9804), (9, 9885), (14, 9981), (15, 10026), (17, 10044), (18, 10050), (20, 10191), (21, 10212), (22, 10257), (24, 10308), (25, 10311), (27, 10341), (29, 10395), (34, 10524), (38, 10602), (39, 10611), (40, 10617), (42, 10629), (44, 10662), (49, 10704), (53, 10749), (55, 10869), (56, 10872), (59, 10947), (61, 11010), (66, 11070), (67, 11088), (68, 11094), (70, 11106), (72, 11124), (79, 11175), (80, 11181), (83, 11205), (85, 11223), (88, 11238), (89, 11247), (93, 11292), (94, 11301), (99, 11322), (102, 11334), (103, 11337), (104, 11358), (105, 11361), (106, 11367), (107, 11373), (111, 11394), (112, 11400), (114, 11421), (117, 11445), (118, 11454), (119, 11466), (121, 11472), (124, 11493), (130, 11544), (131, 11547), (132, 11556), (133, 11559), (142, 11664), (143, 11676), (146, 11697), (154, 11766), (155, 11808), (156, 11820), (157, 11823), (158, 11841), (159, 11844), (163, 11940), (164, 11943), (167, 11997), (169, 12036), (170, 12054), (172, 12084), (173, 12093), (178, 12135), (184, 12255),

Gene: Korra_19 Start: 12572, Stop: 15133, Start Num: 3

Candidate Starts for Korra_19:

(2, 12551), (Start: 3 @12572 has 82 MA's), (6, 12620), (7, 12653), (9, 12701), (10, 12725), (11, 12737), (14, 12797), (16, 12845), (17, 12860), (18, 12866), (19, 12986), (21, 13028), (24, 13124), (25, 13127), (27, 13157), (29, 13211), (35, 13352), (36, 13373), (37, 13397), (38, 13418), (39, 13427), (44, 13478), (46, 13496), (55, 13682), (61, 13826), (63, 13859), (66, 13886), (67, 13904), (68, 13910), (71, 13934), (73, 13943), (79, 13991), (82, 14018), (83, 14021), (86, 14042), (88, 14054), (92, 14105), (95, 14120), (98, 14132), (100, 14141), (102, 14150), (105, 14177), (107, 14189), (109, 14198), (111, 14210), (112, 14216), (114, 14237), (117, 14261), (118, 14270), (124, 14309), (130, 14360), (131, 14363), (132, 14372), (133, 14375), (135, 14390), (142, 14480), (147, 14516), (155, 14624), (159, 14660), (163, 14756), (164, 14759), (167, 14813), (169, 14852), (172, 14900), (173, 14909), (175, 14933), (178, 14951), (180, 15002), (182, 15026), (184, 15074),

Gene: Lakshmi_18 Start: 12636, Stop: 15197, Start Num: 3

Candidate Starts for Lakshmi_18:

(2, 12615), (Start: 3 @12636 has 82 MA's), (8, 12726), (9, 12765), (11, 12801), (14, 12861), (16, 12909), (17, 12924), (21, 13092), (22, 13137), (24, 13188), (25, 13191), (29, 13275), (37, 13461), (40, 13497), (42, 13509), (45, 13551), (54, 13662), (60, 13860), (66, 13953), (68, 13977), (69, 13980), (79, 14058), (80, 14064), (84, 14091), (88, 14121), (94, 14184), (98, 14199), (100, 14208), (101, 14211), (103, 14220), (105, 14244), (107, 14256), (108, 14262), (111, 14277), (112, 14283), (113, 14286), (115, 14307), (116, 14322), (118, 14337), (121, 14355), (122, 14361), (124, 14376), (126, 14385), (127, 14394), (130, 14427), (131, 14430), (133, 14442), (134, 14448), (136, 14460), (140, 14526), (141, 14541), (145, 14571), (146, 14580), (155, 14691), (159, 14727), (160, 14748), (163, 14823), (164, 14826), (167, 14880), (168, 14895), (169, 14919), (173, 14976), (175, 15000), (179, 15042), (180, 15069), (184, 15138),

Gene: Lasagna_14 Start: 9717, Stop: 12278, Start Num: 3

Candidate Starts for Lasagna_14:

(2, 9696), (Start: 3 @9717 has 82 MA's), (6, 9765), (9, 9846), (10, 9870), (14, 9942), (16, 9990), (17, 10005), (18, 10011), (19, 10131), (21, 10173), (24, 10269), (25, 10272), (27, 10302), (32, 10440), (36, 10518), (38, 10563), (39, 10572), (44, 10623), (46, 10641), (47, 10653), (51, 10677), (58, 10893), (62, 10983), (63, 11004), (66, 11031), (67, 11049), (68, 11055), (71, 11079), (73, 11088), (79, 11136), (82, 11163), (87, 11193), (92, 11250), (95, 11265), (98, 11277), (99, 11283), (100, 11286), (102, 11295), (105, 11322), (107, 11334), (109, 11343), (111, 11355), (112, 11361), (115, 11385), (117, 11406), (118, 11415), (120, 11430), (124, 11454), (130, 11505), (131, 11508), (133, 11520), (139, 11595), (142, 11625), (147, 11661), (155, 11769), (156, 11781), (159, 11805), (163, 11901), (164, 11904), (166, 11937), (167, 11958), (169, 11997), (170, 12015), (172, 12045), (173, 12054), (175, 12078), (181, 12153), (184, 12219),

Gene: Lennox_14 Start: 9717, Stop: 12278, Start Num: 3

Candidate Starts for Lennox_14:

(2, 9696), (Start: 3 @9717 has 82 MA's), (6, 9765), (9, 9846), (10, 9870), (14, 9942), (16, 9990), (17, 10005), (18, 10011), (21, 10173), (24, 10269), (27, 10302), (32, 10440), (36, 10518), (38, 10563), (39, 10572), (44, 10623), (46, 10641), (47, 10653), (51, 10677), (58, 10893), (62, 10983), (63, 11004), (66, 11031), (67, 11049), (68, 11055), (71, 11079), (73, 11088), (79, 11136), (82, 11163), (87, 11193), (92, 11250), (95, 11265), (98, 11277), (99, 11283), (100, 11286), (102, 11295), (105, 11322), (107, 11334), (109, 11343), (111, 11355), (112, 11361), (115, 11385), (117, 11406), (118, 11415), (120, 11430), (124, 11454), (130, 11505), (131, 11508), (133, 11520), (142, 11625), (147, 11661), (155, 11769), (156, 11781), (159, 11805), (163, 11901), (164, 11904), (166, 11937), (167, 11958), (169, 11997), (170, 12015), (172, 12045), (173, 12054), (175, 12078), (181, 12153), (184, 12219),

Gene: LilStuart_14 Start: 9717, Stop: 12278, Start Num: 3

Candidate Starts for LilStuart_14:

(2, 9696), (Start: 3 @9717 has 82 MA's), (6, 9765), (9, 9846), (10, 9870), (14, 9942), (16, 9990), (17, 10005), (18, 10011), (21, 10173), (24, 10269), (27, 10302), (32, 10440), (36, 10518), (38, 10563), (39,

10572), (44, 10623), (46, 10641), (47, 10653), (51, 10677), (58, 10893), (62, 10983), (63, 11004), (66, 11031), (67, 11049), (68, 11055), (71, 11079), (73, 11088), (79, 11136), (82, 11163), (87, 11193), (92, 11250), (95, 11265), (98, 11277), (99, 11283), (100, 11286), (102, 11295), (105, 11322), (107, 11334), (109, 11343), (111, 11355), (112, 11361), (115, 11385), (117, 11406), (118, 11415), (120, 11430), (124, 11454), (130, 11505), (131, 11508), (133, 11520), (142, 11625), (147, 11661), (155, 11769), (156, 11781), (159, 11805), (163, 11901), (164, 11904), (166, 11937), (167, 11958), (169, 11997), (170, 12015), (172, 12045), (173, 12054), (175, 12078), (181, 12153), (184, 12219),

Gene: Litotes_18 Start: 12597, Stop: 15152, Start Num: 3

Candidate Starts for Litotes_18:

(2, 12576), (Start: 3 @12597 has 82 MA's), (6, 12645), (9, 12726), (10, 12750), (14, 12822), (16, 12870), (17, 12885), (18, 12891), (21, 13053), (24, 13149), (25, 13152), (27, 13182), (32, 13320), (38, 13443), (44, 13503), (46, 13521), (48, 13536), (53, 13587), (60, 13818), (64, 13887), (66, 13911), (67, 13929), (68, 13935), (75, 13989), (76, 14001), (80, 14022), (83, 14046), (93, 14133), (98, 14157), (99, 14163), (100, 14166), (103, 14178), (104, 14199), (105, 14202), (106, 14208), (107, 14214), (110, 14232), (111, 14235), (112, 14241), (117, 14286), (118, 14295), (121, 14313), (124, 14334), (126, 14343), (127, 14352), (130, 14385), (131, 14388), (132, 14397), (133, 14400), (137, 14451), (155, 14649), (156, 14661), (158, 14682), (159, 14685), (163, 14781), (164, 14784), (167, 14838), (169, 14877), (173, 14934), (178, 14976), (180, 15024), (183, 15066), (184, 15096),

Gene: Lucy_14 Start: 9709, Stop: 12270, Start Num: 3

Candidate Starts for Lucy_14:

(2, 9688), (Start: 3 @9709 has 82 MA's), (6, 9757), (9, 9838), (10, 9862), (14, 9934), (16, 9982), (17, 9997), (18, 10003), (21, 10165), (24, 10261), (25, 10264), (27, 10294), (32, 10432), (36, 10510), (38, 10555), (39, 10564), (44, 10615), (46, 10633), (47, 10645), (51, 10669), (58, 10885), (62, 10975), (63, 10996), (66, 11023), (67, 11041), (68, 11047), (71, 11071), (73, 11080), (79, 11128), (82, 11155), (87, 11185), (92, 11242), (95, 11257), (98, 11269), (99, 11275), (100, 11278), (102, 11287), (105, 11314), (107, 11326), (109, 11335), (111, 11347), (112, 11353), (115, 11377), (117, 11398), (118, 11407), (120, 11422), (124, 11446), (127, 11464), (130, 11497), (131, 11500), (133, 11512), (139, 11587), (142, 11617), (147, 11653), (155, 11761), (156, 11773), (159, 11797), (163, 11893), (164, 11896), (167, 11950), (169, 11989), (170, 12007), (172, 12037), (173, 12046), (175, 12070), (181, 12145), (182, 12163), (184, 12211),

Gene: Makoto_14 Start: 9718, Stop: 12279, Start Num: 3

Candidate Starts for Makoto_14:

(2, 9697), (Start: 3 @9718 has 82 MA's), (6, 9766), (9, 9847), (10, 9871), (14, 9943), (16, 9991), (17, 10006), (18, 10012), (21, 10174), (24, 10270), (27, 10303), (32, 10441), (36, 10519), (38, 10564), (39, 10573), (44, 10624), (46, 10642), (47, 10654), (51, 10678), (58, 10894), (63, 11005), (66, 11032), (67, 11050), (68, 11056), (71, 11080), (73, 11089), (79, 11137), (82, 11164), (87, 11194), (92, 11251), (95, 11266), (98, 11278), (99, 11284), (100, 11287), (102, 11296), (105, 11323), (107, 11335), (109, 11344), (111, 11356), (112, 11362), (115, 11386), (117, 11407), (118, 11416), (120, 11431), (124, 11455), (130, 11506), (131, 11509), (133, 11521), (139, 11596), (142, 11626), (147, 11662), (155, 11770), (156, 11782), (159, 11806), (163, 11902), (164, 11905), (166, 11938), (167, 11959), (170, 12016), (172, 12046), (173, 12055), (175, 12079), (181, 12154), (184, 12220),

Gene: MamaPearl_14 Start: 9752, Stop: 12301, Start Num: 3

Candidate Starts for MamaPearl_14:

(1, 9722), (Start: 3 @9752 has 82 MA's), (9, 9881), (11, 9917), (16, 10025), (17, 10040), (20, 10187), (21, 10208), (24, 10304), (30, 10394), (33, 10487), (38, 10598), (44, 10658), (45, 10667), (59, 10940), (61, 10994), (63, 11027), (65, 11048), (66, 11054), (67, 11072), (79, 11159), (88, 11222), (93, 11276), (94, 11285), (99, 11306), (102, 11318), (103, 11321), (105, 11345), (106, 11351), (107, 11357), (109, 11366), (111, 11378), (112, 11384), (114, 11405), (118, 11438), (120, 11453), (121, 11456), (124, 11477), (125, 11483), (127, 11495), (130, 11528), (131, 11531), (132, 11540), (133, 11543), (135,

11558), (141, 11642), (146, 11681), (155, 11792), (156, 11804), (160, 11849), (163, 11924), (164, 11927), (167, 11981), (172, 12068), (173, 12077), (175, 12101), (177, 12113), (180, 12170), (181, 12176), (184, 12242), (185, 12284),

Gene: Maria1952_14 Start: 9744, Stop: 12302, Start Num: 3

Candidate Starts for Maria1952_14:

(Start: 3 @9744 has 82 MA's), (4, 9753), (5, 9783), (9, 9873), (11, 9909), (16, 10017), (17, 10032), (21, 10200), (24, 10296), (37, 10569), (38, 10590), (43, 10620), (44, 10650), (53, 10737), (56, 10860), (59, 10935), (61, 10998), (63, 11031), (65, 11052), (66, 11058), (67, 11076), (68, 11082), (71, 11106), (76, 11148), (79, 11163), (80, 11169), (84, 11196), (91, 11247), (93, 11280), (94, 11289), (99, 11310), (102, 11322), (105, 11349), (107, 11361), (109, 11370), (111, 11382), (112, 11388), (113, 11391), (115, 11412), (118, 11442), (121, 11460), (124, 11481), (126, 11490), (127, 11499), (130, 11532), (131, 11535), (133, 11547), (135, 11562), (141, 11646), (142, 11652), (147, 11688), (153, 11745), (154, 11754), (155, 11796), (160, 11853), (163, 11928), (164, 11931), (165, 11961), (167, 11985), (170, 12042), (172, 12072), (173, 12081), (175, 12105), (177, 12117), (184, 12243),

Gene: MeganNoll_18 Start: 12624, Stop: 15185, Start Num: 3

Candidate Starts for MeganNoll_18:

(2, 12603), (Start: 3 @12624 has 82 MA's), (6, 12672), (7, 12705), (9, 12753), (10, 12777), (11, 12789), (14, 12849), (16, 12897), (17, 12912), (18, 12918), (19, 13038), (21, 13080), (24, 13176), (25, 13179), (27, 13209), (29, 13263), (30, 13266), (35, 13404), (36, 13425), (37, 13449), (38, 13470), (39, 13479), (44, 13530), (46, 13548), (55, 13734), (61, 13878), (63, 13911), (66, 13938), (67, 13956), (68, 13962), (71, 13986), (73, 13995), (79, 14043), (82, 14070), (83, 14073), (86, 14094), (87, 14100), (88, 14106), (92, 14157), (95, 14172), (98, 14184), (99, 14190), (100, 14193), (102, 14202), (105, 14229), (107, 14241), (109, 14250), (111, 14262), (112, 14268), (114, 14289), (118, 14322), (124, 14361), (130, 14412), (131, 14415), (132, 14424), (133, 14427), (135, 14442), (142, 14532), (147, 14568), (155, 14676), (159, 14712), (163, 14808), (164, 14811), (167, 14865), (169, 14904), (172, 14952), (173, 14961), (175, 14985), (178, 15003), (180, 15054), (182, 15078), (183, 15096), (184, 15126),

Gene: Misaeng_18 Start: 12684, Stop: 15242, Start Num: 3

Candidate Starts for Misaeng_18:

(2, 12663), (Start: 3 @12684 has 82 MA's), (8, 12774), (9, 12813), (11, 12849), (17, 12972), (21, 13140), (22, 13185), (24, 13236), (25, 13239), (29, 13323), (38, 13530), (39, 13539), (42, 13557), (43, 13560), (45, 13599), (56, 13800), (57, 13851), (60, 13905), (66, 13998), (68, 14022), (77, 14091), (79, 14103), (80, 14109), (81, 14112), (84, 14136), (88, 14166), (91, 14187), (96, 14235), (99, 14250), (101, 14256), (103, 14265), (105, 14289), (107, 14301), (108, 14307), (111, 14322), (112, 14328), (113, 14331), (116, 14367), (117, 14373), (118, 14382), (121, 14400), (122, 14406), (124, 14421), (126, 14430), (128, 14448), (130, 14472), (131, 14475), (133, 14487), (136, 14505), (140, 14571), (141, 14586), (145, 14616), (146, 14625), (148, 14640), (153, 14685), (155, 14736), (159, 14772), (163, 14868), (164, 14871), (167, 14925), (169, 14964), (173, 15021), (175, 15045), (179, 15087), (180, 15114), (184, 15183),

Gene: Moki_14 Start: 9720, Stop: 12287, Start Num: 3

Candidate Starts for Moki_14:

(2, 9699), (Start: 3 @9720 has 82 MA's), (6, 9768), (9, 9849), (10, 9873), (14, 9945), (16, 9993), (17, 10008), (18, 10014), (21, 10176), (23, 10269), (24, 10272), (25, 10275), (27, 10305), (30, 10362), (35, 10500), (36, 10521), (38, 10566), (42, 10593), (44, 10626), (46, 10644), (52, 10686), (54, 10743), (63, 11007), (66, 11034), (67, 11052), (68, 11058), (71, 11082), (74, 11103), (79, 11139), (82, 11166), (87, 11196), (88, 11202), (92, 11253), (99, 11286), (105, 11325), (106, 11331), (107, 11337), (109, 11346), (111, 11358), (112, 11364), (115, 11388), (117, 11409), (118, 11418), (124, 11457), (127, 11475), (130, 11508), (131, 11511), (133, 11523), (135, 11538), (138, 11589), (141, 11622), (143, 11640), (147, 11664), (151, 11706), (155, 11772), (156, 11784), (160, 11829), (163, 11904), (164, 11907), (167, 11961), (169, 12000), (171, 12027), (173, 12057), (174, 12069), (175, 12081), (176, 12090),

(180, 12156), (183, 12198), (184, 12228),

Gene: MrGloopy_18 Start: 12558, Stop: 15119, Start Num: 3

Candidate Starts for MrGloopy_18:

(2, 12537), (Start: 3 @12558 has 82 MA's), (6, 12606), (7, 12639), (9, 12687), (10, 12711), (11, 12723), (14, 12783), (16, 12831), (17, 12846), (18, 12852), (19, 12972), (21, 13014), (24, 13110), (25, 13113), (27, 13143), (29, 13197), (35, 13338), (36, 13359), (37, 13383), (38, 13404), (39, 13413), (44, 13464), (46, 13482), (55, 13668), (61, 13812), (63, 13845), (66, 13872), (67, 13890), (68, 13896), (71, 13920), (73, 13929), (79, 13977), (82, 14004), (87, 14034), (88, 14040), (92, 14091), (95, 14106), (98, 14118), (99, 14124), (100, 14127), (102, 14136), (105, 14163), (107, 14175), (109, 14184), (111, 14196), (112, 14202), (114, 14223), (118, 14256), (124, 14295), (130, 14346), (131, 14349), (132, 14358), (133, 14361), (135, 14376), (142, 14466), (147, 14502), (155, 14610), (159, 14646), (163, 14742), (164, 14745), (167, 14799), (169, 14838), (172, 14886), (173, 14895), (175, 14919), (178, 14937), (180, 14988), (182, 15012), (183, 15030), (184, 15060),

Gene: Nancia_14 Start: 9717, Stop: 12278, Start Num: 3

Candidate Starts for Nancia_14:

(2, 9696), (Start: 3 @9717 has 82 MA's), (6, 9765), (9, 9846), (10, 9870), (14, 9942), (16, 9990), (17, 10005), (18, 10011), (19, 10131), (21, 10173), (24, 10269), (25, 10272), (27, 10302), (32, 10440), (36, 10518), (38, 10563), (39, 10572), (44, 10623), (46, 10641), (47, 10653), (51, 10677), (58, 10893), (62, 10983), (63, 11004), (66, 11031), (67, 11049), (68, 11055), (71, 11079), (73, 11088), (79, 11136), (82, 11163), (87, 11193), (92, 11250), (95, 11265), (98, 11277), (99, 11283), (100, 11286), (102, 11295), (105, 11322), (107, 11334), (109, 11343), (111, 11355), (112, 11361), (115, 11385), (117, 11406), (118, 11415), (120, 11430), (124, 11454), (130, 11505), (131, 11508), (133, 11520), (139, 11595), (142, 11625), (147, 11661), (155, 11769), (156, 11781), (159, 11805), (163, 11901), (164, 11904), (166, 11937), (167, 11958), (169, 11997), (170, 12015), (172, 12045), (173, 12054), (175, 12078), (181, 12153), (184, 12219),

Gene: Nubia_18 Start: 12596, Stop: 15157, Start Num: 3

Candidate Starts for Nubia_18:

(2, 12575), (Start: 3 @12596 has 82 MA's), (8, 12686), (9, 12725), (11, 12761), (14, 12821), (16, 12869), (17, 12884), (21, 13052), (22, 13097), (24, 13148), (25, 13151), (29, 13235), (37, 13421), (40, 13457), (42, 13469), (45, 13511), (60, 13820), (66, 13913), (67, 13931), (68, 13937), (79, 14018), (80, 14024), (84, 14051), (88, 14081), (94, 14144), (98, 14159), (99, 14165), (100, 14168), (103, 14180), (105, 14204), (107, 14216), (108, 14222), (111, 14237), (112, 14243), (113, 14246), (115, 14267), (116, 14282), (117, 14288), (118, 14297), (121, 14315), (122, 14321), (124, 14336), (126, 14345), (127, 14354), (130, 14387), (131, 14390), (133, 14402), (134, 14408), (136, 14420), (138, 14468), (140, 14486), (141, 14501), (145, 14531), (146, 14540), (153, 14600), (155, 14651), (159, 14687), (160, 14708), (163, 14783), (164, 14786), (167, 14840), (169, 14879), (173, 14936), (175, 14960), (179, 15002), (180, 15029), (184, 15098),

Gene: OMalley_14 Start: 9738, Stop: 12296, Start Num: 3

Candidate Starts for OMalley_14:

(Start: 3 @9738 has 82 MA's), (4, 9747), (5, 9777), (9, 9867), (14, 9963), (15, 10008), (17, 10026), (21, 10194), (24, 10290), (25, 10293), (26, 10308), (31, 10395), (40, 10599), (41, 10602), (49, 10686), (61, 10992), (66, 11052), (67, 11070), (68, 11076), (73, 11109), (74, 11121), (79, 11157), (82, 11184), (86, 11208), (87, 11214), (92, 11271), (97, 11295), (99, 11304), (103, 11319), (105, 11343), (107, 11355), (111, 11376), (112, 11382), (114, 11403), (117, 11427), (118, 11436), (121, 11454), (124, 11475), (125, 11481), (127, 11493), (130, 11526), (131, 11529), (133, 11541), (135, 11556), (136, 11559), (142, 11646), (152, 11736), (153, 11739), (155, 11790), (160, 11847), (161, 11856), (162, 11868), (163, 11922), (164, 11925), (167, 11979), (169, 12018), (172, 12066), (173, 12075), (175, 12099), (177, 12111), (183, 12207), (184, 12237),

Gene: OurGirlNessie_14 Start: 9709, Stop: 12270, Start Num: 3

Candidate Starts for OurGirlNessie_14:

(2, 9688), (Start: 3 @9709 has 82 MA's), (6, 9757), (9, 9838), (10, 9862), (14, 9934), (16, 9982), (17, 9997), (18, 10003), (21, 10165), (24, 10261), (27, 10294), (32, 10432), (36, 10510), (37, 10534), (38, 10555), (39, 10564), (44, 10615), (46, 10633), (47, 10645), (51, 10669), (58, 10885), (62, 10975), (63, 10996), (66, 11023), (67, 11041), (68, 11047), (71, 11071), (73, 11080), (79, 11128), (82, 11155), (87, 11185), (92, 11242), (95, 11257), (98, 11269), (99, 11275), (100, 11278), (102, 11287), (105, 11314), (107, 11326), (109, 11335), (111, 11347), (112, 11353), (115, 11377), (117, 11398), (118, 11407), (120, 11422), (124, 11446), (127, 11464), (130, 11497), (131, 11500), (133, 11512), (139, 11587), (142, 11617), (147, 11653), (150, 11674), (155, 11761), (156, 11773), (158, 11794), (159, 11797), (163, 11893), (164, 11896), (166, 11929), (167, 11950), (169, 11989), (170, 12007), (172, 12037), (173, 12046), (181, 12145), (184, 12211),

Gene: Oxynfrius_18 Start: 12609, Stop: 15170, Start Num: 3

Candidate Starts for Oxynfrius_18:

(2, 12588), (Start: 3 @12609 has 82 MA's), (8, 12699), (9, 12738), (11, 12774), (14, 12834), (16, 12882), (17, 12897), (21, 13065), (22, 13110), (24, 13161), (25, 13164), (29, 13248), (37, 13434), (40, 13470), (42, 13482), (45, 13524), (54, 13635), (60, 13833), (66, 13926), (68, 13950), (69, 13953), (79, 14031), (80, 14037), (84, 14064), (88, 14094), (94, 14157), (98, 14172), (100, 14181), (101, 14184), (103, 14193), (105, 14217), (107, 14229), (108, 14235), (111, 14250), (112, 14256), (113, 14259), (115, 14280), (116, 14295), (118, 14310), (121, 14328), (122, 14334), (124, 14349), (126, 14358), (127, 14367), (130, 14400), (131, 14403), (133, 14415), (134, 14421), (136, 14433), (140, 14499), (141, 14514), (145, 14544), (146, 14553), (155, 14664), (159, 14700), (160, 14721), (163, 14796), (164, 14799), (167, 14853), (169, 14892), (173, 14949), (175, 14973), (179, 15015), (180, 15042), (184, 15111),

Gene: PartyCup_18 Start: 12644, Stop: 15199, Start Num: 3

Candidate Starts for PartyCup_18:

(2, 12623), (Start: 3 @12644 has 82 MA's), (6, 12692), (9, 12773), (10, 12797), (14, 12869), (16, 12917), (17, 12932), (18, 12938), (21, 13100), (22, 13145), (24, 13196), (25, 13199), (27, 13229), (32, 13367), (38, 13490), (44, 13550), (46, 13568), (48, 13583), (53, 13634), (60, 13865), (64, 13934), (66, 13958), (67, 13976), (68, 13982), (75, 14036), (76, 14048), (80, 14069), (83, 14093), (93, 14180), (98, 14204), (99, 14210), (100, 14213), (103, 14225), (104, 14246), (105, 14249), (106, 14255), (107, 14261), (110, 14279), (111, 14282), (112, 14288), (117, 14333), (118, 14342), (121, 14360), (124, 14381), (126, 14390), (127, 14399), (130, 14432), (131, 14435), (132, 14444), (133, 14447), (137, 14498), (147, 14588), (155, 14696), (156, 14708), (158, 14729), (159, 14732), (163, 14828), (164, 14831), (167, 14885), (169, 14924), (173, 14981), (178, 15023), (180, 15071), (183, 15113), (184, 15143),

Gene: PinkFriday_14 Start: 9750, Stop: 12308, Start Num: 3

Candidate Starts for PinkFriday_14:

(Start: 3 @9750 has 82 MA's), (4, 9759), (9, 9879), (16, 10023), (17, 10038), (21, 10206), (24, 10302), (28, 10347), (30, 10392), (37, 10575), (38, 10596), (39, 10605), (40, 10611), (42, 10623), (44, 10656), (53, 10743), (63, 11037), (65, 11058), (66, 11064), (67, 11082), (68, 11088), (71, 11112), (79, 11169), (82, 11196), (87, 11226), (88, 11232), (92, 11283), (95, 11298), (98, 11310), (100, 11319), (102, 11328), (105, 11355), (107, 11367), (109, 11376), (111, 11388), (112, 11394), (118, 11448), (121, 11466), (123, 11484), (124, 11487), (126, 11496), (127, 11505), (129, 11517), (130, 11538), (131, 11541), (133, 11553), (135, 11568), (141, 11652), (142, 11658), (147, 11694), (153, 11751), (155, 11802), (156, 11814), (160, 11859), (163, 11934), (164, 11937), (165, 11967), (166, 11970), (169, 12030), (170, 12048), (172, 12078), (173, 12087), (175, 12111), (177, 12123), (183, 12219), (184, 12249),

Gene: PitaDog_14 Start: 9708, Stop: 12269, Start Num: 3

Candidate Starts for PitaDog_14:

(2, 9687), (Start: 3 @9708 has 82 MA's), (6, 9756), (9, 9837), (10, 9861), (14, 9933), (16, 9981), (17, 9996), (18, 10002), (21, 10164), (24, 10260), (27, 10293), (32, 10431), (36, 10509), (38, 10554), (39, 10563), (44, 10614), (46, 10632), (51, 10668), (58, 10884), (62, 10974), (63, 10995), (66, 11022), (67, 11040), (68, 11046), (71, 11070), (73, 11079), (79, 11127), (82, 11154), (87, 11184), (92, 11241), (95, 11256), (98, 11268), (99, 11274), (100, 11277), (102, 11286), (105, 11313), (107, 11325), (109, 11334), (111, 11346), (112, 11352), (115, 11376), (117, 11397), (118, 11406), (120, 11421), (124, 11445), (127, 11463), (130, 11496), (131, 11499), (133, 11511), (142, 11616), (147, 11652), (155, 11760), (156, 11772), (159, 11796), (163, 11892), (164, 11895), (166, 11928), (167, 11949), (169, 11988), (170, 12006), (172, 12036), (173, 12045), (175, 12069), (181, 12144), (184, 12210),

Gene: Potatoes_18 Start: 12619, Stop: 15180, Start Num: 3

Candidate Starts for Potatoes_18:

(2, 12598), (Start: 3 @12619 has 82 MA's), (6, 12667), (7, 12700), (9, 12748), (10, 12772), (11, 12784), (14, 12844), (16, 12892), (17, 12907), (18, 12913), (19, 13033), (21, 13075), (23, 13168), (24, 13171), (25, 13174), (27, 13204), (29, 13258), (35, 13399), (36, 13420), (37, 13444), (38, 13465), (39, 13474), (44, 13525), (46, 13543), (50, 13567), (55, 13729), (61, 13873), (63, 13906), (66, 13933), (67, 13951), (68, 13957), (71, 13981), (73, 13990), (79, 14038), (82, 14065), (86, 14089), (87, 14095), (88, 14101), (92, 14152), (95, 14167), (98, 14179), (99, 14185), (100, 14188), (102, 14197), (105, 14224), (107, 14236), (109, 14245), (111, 14257), (112, 14263), (114, 14284), (118, 14317), (124, 14356), (130, 14407), (131, 14410), (132, 14419), (133, 14422), (135, 14437), (141, 14521), (142, 14527), (147, 14563), (155, 14671), (156, 14683), (159, 14707), (163, 14803), (164, 14806), (167, 14860), (169, 14899), (172, 14947), (173, 14956), (175, 14980), (178, 14998), (180, 15049), (182, 15073), (183, 15091), (184, 15121),

Gene: Preamble_14 Start: 9721, Stop: 12279, Start Num: 3

Candidate Starts for Preamble_14:

(2, 9700), (Start: 3 @9721 has 82 MA's), (6, 9769), (9, 9850), (14, 9946), (15, 9991), (17, 10009), (18, 10015), (20, 10156), (21, 10177), (22, 10222), (24, 10273), (25, 10276), (27, 10306), (34, 10489), (38, 10567), (39, 10576), (40, 10582), (42, 10594), (44, 10627), (49, 10669), (53, 10714), (55, 10834), (56, 10837), (61, 10975), (66, 11035), (67, 11053), (68, 11059), (72, 11089), (79, 11140), (80, 11146), (85, 11188), (88, 11203), (89, 11212), (93, 11257), (94, 11266), (99, 11287), (102, 11299), (103, 11302), (104, 11323), (105, 11326), (106, 11332), (107, 11338), (111, 11359), (112, 11365), (114, 11386), (117, 11410), (118, 11419), (121, 11437), (124, 11458), (130, 11509), (131, 11512), (132, 11521), (133, 11524), (142, 11629), (144, 11644), (146, 11662), (154, 11731), (155, 11773), (156, 11785), (158, 11806), (159, 11809), (163, 11905), (164, 11908), (167, 11962), (169, 12001), (170, 12019), (172, 12049), (173, 12058), (178, 12100), (184, 12220),

Gene: Pterodactyl_14 Start: 9710, Stop: 12271, Start Num: 3

Candidate Starts for Pterodactyl_14:

(2, 9689), (Start: 3 @9710 has 82 MA's), (6, 9758), (9, 9839), (10, 9863), (14, 9935), (16, 9983), (17, 9998), (18, 10004), (21, 10166), (24, 10262), (27, 10295), (32, 10433), (36, 10511), (38, 10556), (39, 10565), (44, 10616), (46, 10634), (47, 10646), (51, 10670), (58, 10886), (63, 10997), (66, 11024), (67, 11042), (68, 11048), (71, 11072), (73, 11081), (79, 11129), (82, 11156), (87, 11186), (92, 11243), (95, 11258), (98, 11270), (99, 11276), (100, 11279), (102, 11288), (105, 11315), (107, 11327), (109, 11336), (111, 11348), (112, 11354), (115, 11378), (117, 11399), (118, 11408), (120, 11423), (124, 11447), (130, 11498), (131, 11501), (133, 11513), (139, 11588), (142, 11618), (147, 11654), (155, 11762), (156, 11774), (159, 11798), (163, 11894), (164, 11897), (166, 11930), (167, 11951), (169, 11990), (170, 12008), (172, 12038), (173, 12047), (181, 12146), (184, 12212),

Gene: Pumancara_14 Start: 9749, Stop: 12307, Start Num: 3

Candidate Starts for Pumancara_14:

(Start: 3 @9749 has 82 MA's), (4, 9758), (9, 9878), (16, 10022), (17, 10037), (21, 10205), (24, 10301), (28, 10346), (30, 10391), (37, 10574), (38, 10595), (39, 10604), (40, 10610), (42, 10622), (44, 10655), (53, 10742), (56, 10865), (59, 10940), (61, 11003), (63, 11036), (65, 11057), (66, 11063), (67, 11081), (68, 11087), (71, 11111), (76, 11153), (79, 11168), (80, 11174), (91, 11252), (93, 11285), (94, 11294), (99, 11315), (102, 11327), (105, 11354), (107, 11366), (109, 11375), (111, 11387), (112, 11393), (113, 11396), (115, 11417), (118, 11447), (121, 11465), (123, 11483), (124, 11486), (126, 11495), (127, 11504), (130, 11537), (131, 11540), (133, 11552), (135, 11567), (141, 11651), (142, 11657), (147, 11693), (153, 11750), (155, 11801), (156, 11813), (160, 11858), (163, 11933), (164, 11936), (165, 11966), (169, 12029), (172, 12077), (173, 12086), (175, 12110), (177, 12122), (184, 12248),

Gene: RAP15_18 Start: 12624, Stop: 15185, Start Num: 3

Candidate Starts for RAP15_18:

(2, 12603), (Start: 3 @12624 has 82 MA's), (6, 12672), (7, 12705), (9, 12753), (10, 12777), (11, 12789), (14, 12849), (16, 12897), (17, 12912), (18, 12918), (19, 13038), (21, 13080), (24, 13176), (25, 13179), (27, 13209), (29, 13263), (30, 13266), (35, 13404), (36, 13425), (37, 13449), (38, 13470), (39, 13479), (44, 13530), (46, 13548), (55, 13734), (61, 13878), (63, 13911), (66, 13938), (67, 13956), (68, 13962), (71, 13986), (73, 13995), (79, 14043), (82, 14070), (83, 14073), (86, 14094), (87, 14100), (88, 14106), (92, 14157), (95, 14172), (98, 14184), (99, 14190), (100, 14193), (102, 14202), (105, 14229), (107, 14241), (109, 14250), (111, 14262), (112, 14268), (114, 14289), (118, 14322), (124, 14361), (130, 14412), (131, 14415), (132, 14424), (133, 14427), (135, 14442), (142, 14532), (147, 14568), (155, 14676), (159, 14712), (163, 14808), (164, 14811), (167, 14865), (169, 14904), (172, 14952), (173, 14961), (175, 14985), (178, 15003), (180, 15054), (182, 15078), (183, 15096), (184, 15126),

Gene: RcigaStruga_18 Start: 12617, Stop: 15178, Start Num: 3

Candidate Starts for RcigaStruga_18:

(2, 12596), (Start: 3 @12617 has 82 MA's), (8, 12707), (9, 12746), (11, 12782), (14, 12842), (17, 12905), (21, 13073), (22, 13118), (23, 13166), (24, 13169), (25, 13172), (29, 13256), (30, 13259), (35, 13397), (38, 13463), (42, 13490), (45, 13532), (60, 13841), (61, 13874), (66, 13934), (68, 13958), (79, 14039), (80, 14045), (81, 14048), (84, 14072), (88, 14102), (91, 14123), (96, 14171), (99, 14186), (103, 14201), (105, 14225), (107, 14237), (108, 14243), (111, 14258), (112, 14264), (116, 14303), (117, 14309), (118, 14318), (121, 14336), (122, 14342), (123, 14354), (124, 14357), (126, 14366), (128, 14384), (130, 14408), (131, 14411), (133, 14423), (136, 14441), (140, 14507), (141, 14522), (145, 14552), (146, 14561), (153, 14621), (155, 14672), (159, 14708), (163, 14804), (164, 14807), (167, 14861), (169, 14900), (171, 14927), (173, 14957), (175, 14981), (179, 15023), (180, 15050), (184, 15119),

Gene: Riovina_14 Start: 9738, Stop: 12296, Start Num: 3

Candidate Starts for Riovina_14:

(Start: 3 @9738 has 82 MA's), (4, 9747), (5, 9777), (9, 9867), (14, 9963), (15, 10008), (17, 10026), (21, 10194), (24, 10290), (25, 10293), (26, 10308), (31, 10395), (40, 10599), (41, 10602), (49, 10686), (61, 10992), (66, 11052), (67, 11070), (68, 11076), (73, 11109), (74, 11121), (79, 11157), (82, 11184), (86, 11208), (87, 11214), (92, 11271), (97, 11295), (99, 11304), (103, 11319), (105, 11343), (107, 11355), (111, 11376), (112, 11382), (114, 11403), (117, 11427), (118, 11436), (121, 11454), (124, 11475), (125, 11481), (127, 11493), (130, 11526), (131, 11529), (133, 11541), (135, 11556), (136, 11559), (142, 11646), (152, 11736), (153, 11739), (155, 11790), (160, 11847), (161, 11856), (162, 11868), (163, 11922), (164, 11925), (167, 11979), (169, 12018), (172, 12066), (173, 12075), (175, 12099), (177, 12111), (183, 12207), (184, 12237),

Gene: Riverdale_18 Start: 12554, Stop: 15115, Start Num: 3

Candidate Starts for Riverdale_18:

(2, 12533), (Start: 3 @12554 has 82 MA's), (6, 12602), (7, 12635), (9, 12683), (10, 12707), (11, 12719), (14, 12779), (16, 12827), (17, 12842), (18, 12848), (19, 12968), (21, 13010), (24, 13106), (25, 13109), (27, 13139), (29, 13193), (35, 13334), (36, 13355), (37, 13379), (38, 13400), (39, 13409), (44,

13460), (46, 13478), (61, 13808), (63, 13841), (66, 13868), (67, 13886), (68, 13892), (71, 13916), (73, 13925), (79, 13973), (82, 14000), (87, 14030), (88, 14036), (92, 14087), (95, 14102), (98, 14114), (99, 14120), (100, 14123), (105, 14159), (107, 14171), (109, 14180), (111, 14192), (112, 14198), (114, 14219), (118, 14252), (124, 14291), (127, 14309), (130, 14342), (131, 14345), (132, 14354), (133, 14357), (135, 14372), (142, 14462), (147, 14498), (155, 14606), (159, 14642), (160, 14663), (163, 14738), (164, 14741), (167, 14795), (169, 14834), (172, 14882), (173, 14891), (175, 14915), (178, 14933), (180, 14984), (182, 15008), (183, 15026), (184, 15056),

Gene: Rozby_18 Start: 12555, Stop: 15116, Start Num: 3

Candidate Starts for Rozby_18:

(2, 12534), (Start: 3 @12555 has 82 MA's), (6, 12603), (7, 12636), (9, 12684), (10, 12708), (11, 12720), (14, 12780), (16, 12828), (17, 12843), (18, 12849), (19, 12969), (21, 13011), (24, 13107), (25, 13110), (27, 13140), (29, 13194), (35, 13335), (36, 13356), (37, 13380), (38, 13401), (39, 13410), (44, 13461), (46, 13479), (55, 13665), (61, 13809), (63, 13842), (66, 13869), (67, 13887), (68, 13893), (71, 13917), (73, 13926), (79, 13974), (82, 14001), (87, 14031), (88, 14037), (92, 14088), (95, 14103), (98, 14115), (99, 14121), (100, 14124), (105, 14160), (107, 14172), (109, 14181), (111, 14193), (112, 14199), (114, 14220), (118, 14253), (124, 14292), (127, 14310), (130, 14343), (131, 14346), (132, 14355), (133, 14358), (135, 14373), (142, 14463), (147, 14499), (155, 14607), (159, 14643), (160, 14664), (163, 14739), (164, 14742), (167, 14796), (169, 14835), (172, 14883), (173, 14892), (175, 14916), (178, 14934), (180, 14985), (182, 15009), (183, 15027), (184, 15057),

Gene: Savage2526_18 Start: 12618, Stop: 15179, Start Num: 3

Candidate Starts for Savage2526_18:

(2, 12597), (Start: 3 @12618 has 82 MA's), (6, 12666), (7, 12699), (9, 12747), (10, 12771), (11, 12783), (14, 12843), (16, 12891), (17, 12906), (18, 12912), (19, 13032), (21, 13074), (24, 13170), (25, 13173), (27, 13203), (29, 13257), (35, 13398), (36, 13419), (37, 13443), (38, 13464), (39, 13473), (44, 13524), (46, 13542), (55, 13728), (61, 13872), (63, 13905), (66, 13932), (67, 13950), (68, 13956), (71, 13980), (73, 13989), (79, 14037), (82, 14064), (87, 14094), (88, 14100), (92, 14151), (95, 14166), (98, 14178), (99, 14184), (100, 14187), (102, 14196), (105, 14223), (107, 14235), (109, 14244), (111, 14256), (112, 14262), (114, 14283), (117, 14307), (118, 14316), (124, 14355), (127, 14373), (130, 14406), (131, 14409), (132, 14418), (133, 14421), (135, 14436), (142, 14526), (147, 14562), (155, 14670), (159, 14706), (163, 14802), (164, 14805), (167, 14859), (169, 14898), (172, 14946), (173, 14955), (175, 14979), (178, 14997), (180, 15048), (182, 15072), (183, 15090), (184, 15120),

Gene: Scuttle_18 Start: 12623, Stop: 15184, Start Num: 3

Candidate Starts for Scuttle_18:

(2, 12602), (Start: 3 @12623 has 82 MA's), (6, 12671), (7, 12704), (9, 12752), (10, 12776), (11, 12788), (14, 12848), (16, 12896), (17, 12911), (18, 12917), (19, 13037), (21, 13079), (24, 13175), (25, 13178), (27, 13208), (29, 13262), (35, 13403), (36, 13424), (37, 13448), (38, 13469), (39, 13478), (44, 13529), (46, 13547), (50, 13571), (55, 13733), (61, 13877), (63, 13910), (66, 13937), (67, 13955), (68, 13961), (71, 13985), (73, 13994), (79, 14042), (82, 14069), (86, 14093), (87, 14099), (88, 14105), (92, 14156), (95, 14171), (98, 14183), (99, 14189), (100, 14192), (102, 14201), (105, 14228), (107, 14240), (109, 14249), (111, 14261), (112, 14267), (114, 14288), (118, 14321), (124, 14360), (130, 14411), (131, 14414), (132, 14423), (133, 14426), (135, 14441), (141, 14525), (142, 14531), (147, 14567), (155, 14675), (159, 14711), (163, 14807), (164, 14810), (167, 14864), (169, 14903), (172, 14951), (173, 14960), (175, 14984), (178, 15002), (180, 15053), (182, 15077), (183, 15095), (184, 15125),

Gene: Sergei_14 Start: 9744, Stop: 12302, Start Num: 3

Candidate Starts for Sergei_14:

(Start: 3 @9744 has 82 MA's), (4, 9753), (5, 9783), (9, 9873), (11, 9909), (16, 10017), (17, 10032), (21, 10200), (24, 10296), (37, 10569), (38, 10590), (43, 10620), (44, 10650), (53, 10737), (56, 10860), (59, 10935), (61, 10998), (63, 11031), (65, 11052), (66, 11058), (67, 11076), (68, 11082), (71, 11106), (76, 11148), (79, 11163), (80, 11169), (84, 11196), (91, 11247), (93, 11280), (94, 11289), (99, 11310),

(102, 11322), (105, 11349), (107, 11361), (109, 11370), (111, 11382), (112, 11388), (113, 11391), (115, 11412), (118, 11442), (121, 11460), (124, 11481), (126, 11490), (127, 11499), (130, 11532), (131, 11535), (133, 11547), (135, 11562), (141, 11646), (142, 11652), (147, 11688), (153, 11745), (154, 11754), (155, 11796), (160, 11853), (163, 11928), (164, 11931), (165, 11961), (167, 11985), (170, 12042), (172, 12072), (173, 12081), (175, 12105), (177, 12117), (184, 12243),

Gene: Supakev_14 Start: 9740, Stop: 12298, Start Num: 3

Candidate Starts for Supakev_14:

(Start: 3 @9740 has 82 MA's), (4, 9749), (5, 9779), (9, 9869), (14, 9965), (15, 10010), (17, 10028), (21, 10196), (24, 10292), (25, 10295), (26, 10310), (31, 10397), (40, 10601), (41, 10604), (49, 10688), (61, 10994), (66, 11054), (67, 11072), (68, 11078), (73, 11111), (74, 11123), (79, 11159), (82, 11186), (86, 11210), (87, 11216), (92, 11273), (97, 11297), (99, 11306), (103, 11321), (105, 11345), (107, 11357), (111, 11378), (112, 11384), (114, 11405), (117, 11429), (118, 11438), (121, 11456), (124, 11477), (125, 11483), (127, 11495), (130, 11528), (131, 11531), (133, 11543), (135, 11558), (136, 11561), (142, 11648), (152, 11738), (153, 11741), (155, 11792), (160, 11849), (161, 11858), (163, 11924), (164, 11927), (167, 11981), (169, 12020), (172, 12068), (173, 12077), (175, 12101), (177, 12113), (183, 12209), (184, 12239),

Gene: Suppi_18 Start: 12647, Stop: 15202, Start Num: 3

Candidate Starts for Suppi_18:

(2, 12626), (Start: 3 @12647 has 82 MA's), (6, 12695), (9, 12776), (10, 12800), (14, 12872), (16, 12920), (17, 12935), (18, 12941), (21, 13103), (22, 13148), (24, 13199), (25, 13202), (27, 13232), (32, 13370), (38, 13493), (44, 13553), (46, 13571), (48, 13586), (53, 13637), (60, 13868), (64, 13937), (66, 13961), (67, 13979), (68, 13985), (75, 14039), (76, 14051), (80, 14072), (83, 14096), (93, 14183), (98, 14207), (99, 14213), (100, 14216), (103, 14228), (104, 14249), (105, 14252), (106, 14258), (107, 14264), (109, 14273), (110, 14282), (111, 14285), (112, 14291), (115, 14315), (117, 14336), (118, 14345), (121, 14363), (124, 14384), (126, 14393), (127, 14402), (130, 14435), (131, 14438), (132, 14447), (133, 14450), (137, 14501), (147, 14591), (155, 14699), (156, 14711), (158, 14732), (159, 14735), (163, 14831), (164, 14834), (167, 14888), (169, 14927), (173, 14984), (178, 15026), (180, 15074), (183, 15116), (184, 15146),

Gene: TattModd_18 Start: 12617, Stop: 15178, Start Num: 3

Candidate Starts for TattModd_18:

(2, 12596), (Start: 3 @12617 has 82 MA's), (6, 12665), (7, 12698), (9, 12746), (10, 12770), (11, 12782), (14, 12842), (16, 12890), (17, 12905), (18, 12911), (19, 13031), (21, 13073), (24, 13169), (25, 13172), (27, 13202), (29, 13256), (35, 13397), (36, 13418), (37, 13442), (38, 13463), (39, 13472), (44, 13523), (46, 13541), (55, 13727), (61, 13871), (63, 13904), (66, 13931), (67, 13949), (68, 13955), (71, 13979), (73, 13988), (79, 14036), (82, 14063), (87, 14093), (88, 14099), (92, 14150), (95, 14165), (98, 14177), (99, 14183), (100, 14186), (102, 14195), (105, 14222), (107, 14234), (109, 14243), (111, 14255), (112, 14261), (114, 14282), (117, 14306), (118, 14315), (124, 14354), (127, 14372), (130, 14405), (131, 14408), (132, 14417), (133, 14420), (135, 14435), (142, 14525), (147, 14561), (155, 14669), (159, 14705), (163, 14801), (164, 14804), (167, 14858), (169, 14897), (172, 14945), (173, 14954), (175, 14978), (178, 14996), (180, 15047), (182, 15071), (183, 15089), (184, 15119),

Gene: Temper16_14 Start: 9744, Stop: 12302, Start Num: 3

Candidate Starts for Temper16_14:

(Start: 3 @9744 has 82 MA's), (4, 9753), (5, 9783), (9, 9873), (11, 9909), (16, 10017), (17, 10032), (21, 10200), (24, 10296), (37, 10569), (38, 10590), (43, 10620), (44, 10650), (53, 10737), (56, 10860), (59, 10935), (61, 10998), (63, 11031), (65, 11052), (66, 11058), (67, 11076), (68, 11082), (71, 11106), (76, 11148), (79, 11163), (80, 11169), (84, 11196), (91, 11247), (93, 11280), (94, 11289), (99, 11310), (102, 11322), (105, 11349), (107, 11361), (109, 11370), (111, 11382), (112, 11388), (113, 11391), (115, 11412), (118, 11442), (121, 11460), (124, 11481), (126, 11490), (127, 11499), (130, 11532), (131, 11535), (133, 11547), (135, 11562), (141, 11646), (142, 11652), (147, 11688), (153, 11745),

(154, 11754), (155, 11796), (160, 11853), (163, 11928), (164, 11931), (165, 11961), (167, 11985),
(170, 12042), (172, 12072), (173, 12081), (175, 12105), (177, 12117), (184, 12243),

Gene: Urla_14 Start: 9754, Stop: 12303, Start Num: 3

Candidate Starts for Urla_14:

(Start: 3 @9754 has 82 MA's), (9, 9883), (11, 9919), (16, 10027), (17, 10042), (20, 10189), (21, 10210), (24, 10306), (30, 10396), (38, 10600), (44, 10660), (45, 10669), (61, 10996), (65, 11050), (66, 11056), (67, 11074), (73, 11113), (79, 11161), (88, 11224), (93, 11278), (98, 11302), (99, 11308), (105, 11347), (107, 11359), (110, 11377), (111, 11380), (112, 11386), (113, 11389), (114, 11407), (118, 11440), (121, 11458), (124, 11479), (126, 11488), (127, 11497), (130, 11530), (131, 11533), (132, 11542), (133, 11545), (135, 11560), (141, 11644), (147, 11686), (155, 11794), (156, 11806), (160, 11851), (161, 11860), (163, 11926), (164, 11929), (167, 11983), (169, 12022), (172, 12070), (173, 12079), (175, 12103), (177, 12115), (180, 12172), (181, 12178), (184, 12244), (185, 12286),

Gene: Vallejo_18 Start: 12556, Stop: 15117, Start Num: 3

Candidate Starts for Vallejo_18:

(2, 12535), (Start: 3 @12556 has 82 MA's), (6, 12604), (7, 12637), (9, 12685), (10, 12709), (11, 12721), (14, 12781), (16, 12829), (17, 12844), (18, 12850), (19, 12970), (21, 13012), (24, 13108), (25, 13111), (27, 13141), (29, 13195), (30, 13198), (35, 13336), (36, 13357), (37, 13381), (38, 13402), (39, 13411), (44, 13462), (46, 13480), (55, 13666), (61, 13810), (63, 13843), (66, 13870), (67, 13888), (68, 13894), (71, 13918), (73, 13927), (79, 13975), (82, 14002), (83, 14005), (86, 14026), (87, 14032), (88, 14038), (92, 14089), (95, 14104), (98, 14116), (99, 14122), (100, 14125), (102, 14134), (105, 14161), (107, 14173), (109, 14182), (111, 14194), (112, 14200), (114, 14221), (118, 14254), (124, 14293), (130, 14344), (131, 14347), (132, 14356), (133, 14359), (135, 14374), (142, 14464), (147, 14500), (155, 14608), (159, 14644), (163, 14740), (164, 14743), (167, 14797), (169, 14836), (172, 14884), (173, 14893), (175, 14917), (178, 14935), (180, 14986), (182, 15010), (183, 15028), (184, 15058),

Gene: Vulture_14 Start: 9738, Stop: 12296, Start Num: 3

Candidate Starts for Vulture_14:

(Start: 3 @9738 has 82 MA's), (4, 9747), (5, 9777), (9, 9867), (14, 9963), (17, 10026), (21, 10194), (24, 10290), (25, 10293), (26, 10308), (31, 10395), (32, 10461), (40, 10599), (41, 10602), (49, 10686), (61, 10992), (66, 11052), (67, 11070), (68, 11076), (73, 11109), (74, 11121), (79, 11157), (82, 11184), (86, 11208), (87, 11214), (92, 11271), (97, 11295), (99, 11304), (103, 11319), (105, 11343), (107, 11355), (111, 11376), (112, 11382), (114, 11403), (117, 11427), (118, 11436), (121, 11454), (124, 11475), (125, 11481), (127, 11493), (130, 11526), (131, 11529), (133, 11541), (135, 11556), (136, 11559), (142, 11646), (152, 11736), (153, 11739), (155, 11790), (160, 11847), (161, 11856), (162, 11868), (163, 11922), (164, 11925), (167, 11979), (169, 12018), (172, 12066), (173, 12075), (175, 12099), (177, 12111), (183, 12207), (184, 12237),

Gene: Wawa_18 Start: 12593, Stop: 15154, Start Num: 3

Candidate Starts for Wawa_18:

(2, 12572), (Start: 3 @12593 has 82 MA's), (6, 12641), (7, 12674), (9, 12722), (10, 12746), (11, 12758), (14, 12818), (16, 12866), (17, 12881), (18, 12887), (19, 13007), (21, 13049), (24, 13145), (25, 13148), (27, 13178), (29, 13232), (35, 13373), (36, 13394), (37, 13418), (38, 13439), (39, 13448), (44, 13499), (46, 13517), (55, 13703), (61, 13847), (63, 13880), (66, 13907), (67, 13925), (68, 13931), (71, 13955), (73, 13964), (79, 14012), (82, 14039), (83, 14042), (86, 14063), (87, 14069), (88, 14075), (92, 14126), (95, 14141), (98, 14153), (99, 14159), (100, 14162), (102, 14171), (105, 14198), (107, 14210), (109, 14219), (111, 14231), (112, 14237), (114, 14258), (118, 14291), (124, 14330), (130, 14381), (131, 14384), (132, 14393), (133, 14396), (135, 14411), (142, 14501), (147, 14537), (155, 14645), (159, 14681), (163, 14777), (164, 14780), (167, 14834), (169, 14873), (172, 14921), (173, 14930), (175, 14954), (178, 14972), (180, 15023), (182, 15047), (183, 15065), (184, 15095),

Gene: Wayne_18 Start: 12693, Stop: 15248, Start Num: 3

Candidate Starts for Wayne_18:

(2, 12672), (Start: 3 @12693 has 82 MA's), (6, 12741), (9, 12822), (10, 12846), (14, 12918), (16, 12966), (17, 12981), (18, 12987), (21, 13149), (22, 13194), (24, 13245), (25, 13248), (27, 13278), (32, 13416), (38, 13539), (44, 13599), (46, 13617), (48, 13632), (53, 13683), (60, 13914), (64, 13983), (66, 14007), (67, 14025), (68, 14031), (75, 14085), (76, 14097), (80, 14118), (83, 14142), (93, 14229), (98, 14253), (99, 14259), (100, 14262), (103, 14274), (104, 14295), (105, 14298), (106, 14304), (107, 14310), (110, 14328), (111, 14331), (112, 14337), (117, 14382), (118, 14391), (121, 14409), (124, 14430), (126, 14439), (127, 14448), (130, 14481), (131, 14484), (132, 14493), (133, 14496), (137, 14547), (147, 14637), (155, 14745), (156, 14757), (158, 14778), (159, 14781), (163, 14877), (164, 14880), (167, 14934), (169, 14973), (173, 15030), (178, 15072), (180, 15120), (183, 15162), (184, 15192),

Gene: WonderBoy_14 Start: 9710, Stop: 12271, Start Num: 3

Candidate Starts for WonderBoy_14:

(2, 9689), (Start: 3 @9710 has 82 MA's), (6, 9758), (9, 9839), (10, 9863), (14, 9935), (16, 9983), (17, 9998), (18, 10004), (21, 10166), (24, 10262), (25, 10265), (27, 10295), (32, 10433), (36, 10511), (38, 10556), (39, 10565), (44, 10616), (46, 10634), (47, 10646), (51, 10670), (58, 10886), (62, 10976), (63, 10997), (66, 11024), (67, 11042), (68, 11048), (71, 11072), (73, 11081), (79, 11129), (82, 11156), (87, 11186), (92, 11243), (95, 11258), (98, 11270), (99, 11276), (100, 11279), (102, 11288), (105, 11315), (107, 11327), (109, 11336), (111, 11348), (112, 11354), (115, 11378), (117, 11399), (118, 11408), (120, 11423), (124, 11447), (130, 11498), (131, 11501), (133, 11513), (136, 11531), (142, 11618), (147, 11654), (155, 11762), (156, 11774), (158, 11795), (159, 11798), (160, 11819), (163, 11894), (164, 11897), (166, 11930), (167, 11951), (169, 11990), (170, 12008), (172, 12038), (173, 12047), (181, 12146), (184, 12212),

Gene: Zorro_18 Start: 12572, Stop: 15133, Start Num: 3

Candidate Starts for Zorro_18:

(2, 12551), (Start: 3 @12572 has 82 MA's), (6, 12620), (7, 12653), (9, 12701), (10, 12725), (11, 12737), (14, 12797), (16, 12845), (17, 12860), (18, 12866), (19, 12986), (21, 13028), (24, 13124), (25, 13127), (27, 13157), (29, 13211), (35, 13352), (36, 13373), (37, 13397), (38, 13418), (39, 13427), (44, 13478), (46, 13496), (55, 13682), (61, 13826), (63, 13859), (66, 13886), (67, 13904), (68, 13910), (71, 13934), (73, 13943), (79, 13991), (82, 14018), (83, 14021), (86, 14042), (88, 14054), (92, 14105), (95, 14120), (98, 14132), (100, 14141), (102, 14150), (105, 14177), (107, 14189), (109, 14198), (111, 14210), (112, 14216), (114, 14237), (117, 14261), (118, 14270), (124, 14309), (130, 14360), (131, 14363), (132, 14372), (133, 14375), (135, 14390), (142, 14480), (147, 14516), (155, 14624), (159, 14660), (163, 14756), (164, 14759), (167, 14813), (169, 14852), (172, 14900), (173, 14909), (175, 14933), (178, 14951), (180, 15002), (182, 15026), (183, 15044), (184, 15074),