INTERSPECIES HYBRID

Ultramel Charcoal (aka: Ultra charcoal)
Most Commonly Used Name: Ultramel Charcoal
Mode of Genetic Inheritance: Codominant with Amel
Morph Type: Codominant (only with Amel) & recessive Charcoal
Eye Color: Dark Red pupil & body ground colored iris
Note: Ultramel is the heterozygote of the the mutation, Ultra.
See ULTRamel for an explanation of the genetic mechanics of the ULTRA codominant mutation.

INTERSPECIES HYBRID

The founder (discoverer) of the Ultra mutation states that he originally paired a gray rat snake with a corn snake, in the discovery of this mutation. By the time most of us were made aware of the HYBRID origins of Ultra types (originally named *Ultra Hypos*), we had already bred it into many other corn snake mutations. It was therefore collectively decided that in so much as it would be virtually impossible to track down (and eliminate) each and every snake containing the Ultra gene (surely thousands of individuals in the collections of hundreds of breeders and keepers), the mutation would be treated like other pure corns. In so much as it generally did not alter the corn snake appearance, it was known that even if peoples' snakes had the Ultra gene mutation, they would either be unaware or could avoid mentioning it. Those of you out there that are boycotting HYBRID corns are advised to avoid acquisition of suspicious-looking corns with the word ULTRA in the morph description. Likewise, purists that admirably endeavor to promote only the genetically purest of corns are urged to question corns that have suspiciously abnormal features that have been historically identified as *hybrid markers. Not that all such markers are proof of alien origins.* Especially because of the difficulty and expense of formulating a DNA base line for all North American colubrid snake species, and in the absence of expensive DNA testing to identify authenticity of pure corns, without obvious visual and/or genetic distinctions, identification of legitimately pure (or impure) corns is difficult at this time, if not completely impossible.
Other than appearance, the primary (and inherent) value of Ultra Type Corns (Ultras and Ultramels and their color and pattern compounds) is their mode of genetic inheritance. Since they are co-dominant to Amelanistics, pairing any Ultra Type to ANY Amel corn (or Het thereof) will render Ultra types in the F^1 (first) generation of out-crossing to non-Ultra type corns. The results of pairing an Ultra-type with a non-Amel corn (or Het thereof) will render Mendelian results that parallel recessively-inherited mutations; no Ultra-types will result and all progeny will be Het for Ultra when bred to non-Amels.

What to expect:
Ultramel Charcoals are stunning. As anticipated, they are very much like the Anery Ultramels, but with a softer

version of black or gray. Some have the pink violet colored blush in the cheeks and neck, but ovrer all coloration will be different hues of gray. Like their Ultramel Anery cousins, expect a great deal of carotenoid yellow as they mature. Of course, there will be no apparent yellow until they are a few months old. Then, yellow will increase rapidly with maturity. The other obvious distinction between Anery and Charcoals is in the eyes. Ultramel Charcoals have less contrast between pupil and iris than do Ultramel Aneries.

INTERSPECIES HYBRID – ULTRA / ULTRAMEL

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Ultramel corns are the heterozygous (hobby abbreviation *Het*) products of the Ultra mutation. At SMR, we seldom offer the homozygous version of the Ultra mutation because there is a subtle and often indistinguishable difference between the homo (Ultra) and het (Ultramel) versions. Genetically speaking, Ultras are the powerhouse genetic version of this mutation in so much as when you breed one to any Amel corn snake, 100% of the progeny will be Ultramels. Breeding Ultramels to Amels results in approximately 50% Ultramels and approximately 50% Amels. Generally, Ultramels are more colorful than Ultras, but there are exceptions in both directions.

Both Ultras and Ultramels render some of the most extreme examples of hypomelanism in corns, but a hypo phenotype is their genetic and visual function we recognize. Some people call them Ultra or Ultramel Hypos,

but I prefer to leave off the “hypo” since the chromosomal location of this mutation is the same as Amel (Ultra and Amel reside on the same locus of the chromosome). Also, the hobby vernacular for the double mutant that is homozygous for both Hypo A and Ultramel would be Ultramel Hypo. Upon hearing/reading these two words together, you would surely presume that the snake Ultramel Hypo is a double mutant. Hence, those two words together are incorrect and confusing — when describing the single mutant, Ultramel or Ultra. When you breed an Ultra type to a phenotype and/genotype of non-Amel, this mutation genetically behaves as a recessive. Example: Pairing an Ultra with an Amel results in 100% Ultramel progeny. Pairing an Ultramel with an Amel results in progeny consisting of approximately 50% Amels and approximately 50% Ultramels. Pairing an Ultra with a wild-type corn that is not het for Amel results in 100% normals (wild type) that are all het for Ultra.

Important Note:

The advertising images on our web site are representations of the average adult example of each morph. These images are not renderings of the actual animals being offered, (except for uniquely offered snakes found in the SURPLUS section of this web site). We do not provide pictures of individual hatchling snakes for sale, nor do we recommend that you ever choose a new pet based on an image of its neonatal form. Corns change so dramatically from hatchling to adult, they will NEVER have the same colors or contrasts throughout maturity. While most of the snakes we produce will mature to resemble the featured adult image(s) on our web site, unlike manufactured products that are respectively clones of each other, the nature of polygenic variation results in each animal being similar but not identical to others of its morph. The snake we select for you may not mature to be identical to the pictured examples, but will be chosen based on our experience of observing which neonates will mature to properly represent their respective morph. We take this responsibility very seriously, and therefore publish the guarantee that we will exchange your SMR snake if it does not mature to be like our advertised examples.