## University of Montana Conservation Genetics Laboratory

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Lee;

As requested, I have gone back and looked at the PINE data obtained from the Price Creek samples. A total of six samples were obtained from the drainage July 30-31, 2002: Price Creek downstream to upstream T14S R4W S19DD (#3192, N=11), T15S R4W S32BC (#3185, N=19), and T15S R4W S5CB (#3196, N=12); West Fork Price Creek downstream to upstream T14S R4W S31AC (#3182, N=8) and T15S R4W S5CB (#3196, N=21); tributary 2 to Price Creek T15S R4W S8DA (#3188, N=8). In all the samples except the uppermost one from Price Creek, PINE fragments characteristic of only westslope cutthroat trout, *Onchorhynchus clarki lewisi*, were detected. Thus, there was no evidence of hybridization in these samples. In contrast to these results, two fish in the uppermost Price Creek sample possessed a PINE fragment usually characteristic of Yellowstone cutthroat trout, *O. c. bouvieri*, at one of the four loci analyzed that usually distinguish westslope and Yellowstone cutthroat trout. In both of these fish, the fragment usually characteristic of Yellowstone cutthroat trout was detected at the same locus.

There are two possible interpretations of the observed variation at the one PINE locus. It could indicate a small amount of hybridization with Yellowstone cutthroat trout or it could simply be westslope cutthroat trout PINE genetic variation that is electrophoretically indistinguishable from that usually characteristic of Yellowstone cutthroat trout. A previous allozyme analysis of fish collected from Price Creek October 9, 1991 (#599, T14S R4W S32, N=25) detected alleles characteristic of both westslope and Yellowstone cutthroat trout at five of the 11 diagnostic loci between these fishes that were analyzed. This sample, therefore, clearly indicated hybridization between westslope and Yellowstone cutthroat trout. Thus, we strongly suspect that the PINE variation detected is also due to hybridization and, conclude that the upper reaches of Price Creek contain a hybridized westslope and Yellowstone cutthroat trout genetic contribution.

Robb Leary