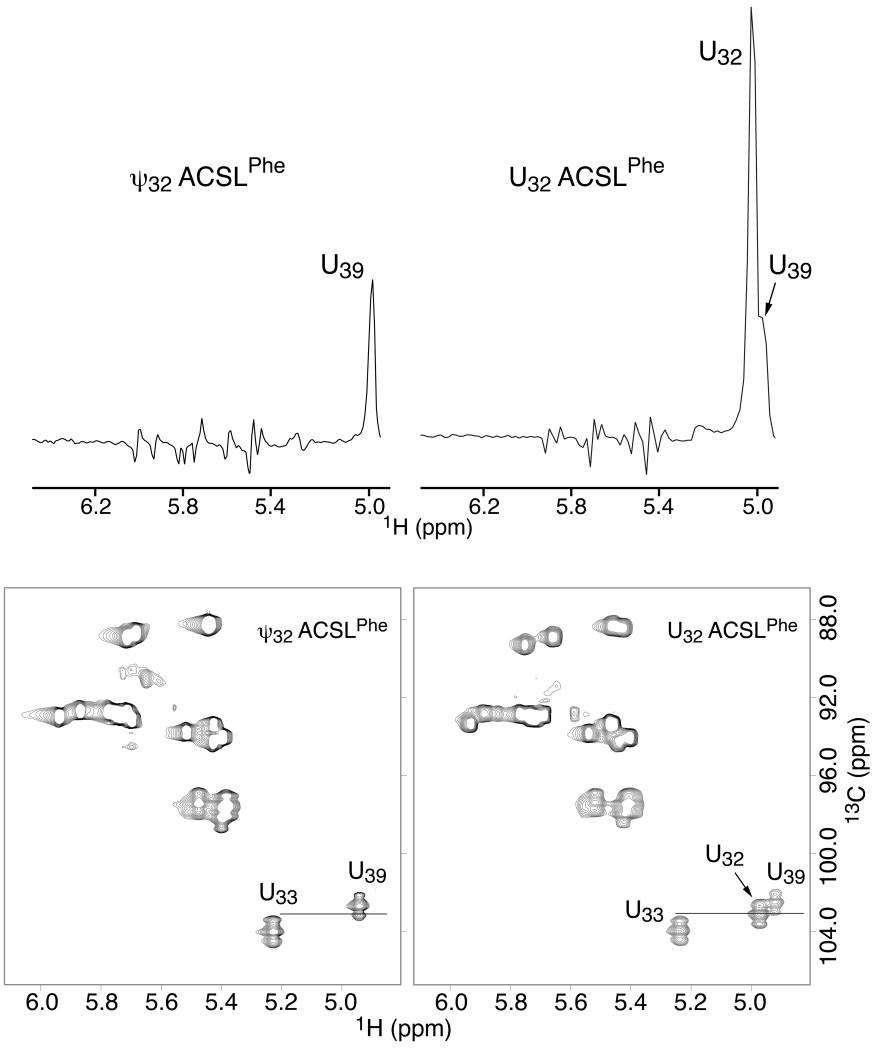
Figure S1. C5/C1' regions of $^{13}C$-$^{1}H$ HSQC spectra (bottom) of the anticodon stem-loop after ($\psi_{32}ACSL^{Phe}$) and before ($ACSL^{Phe}$) modification. Isomerization of uridine to form the C5-C1' glycosidic bond results in loss of the C5-H5 cross peak. One-dimensional slices (above) through the HSQC spectra at the chemical shift corresponding to $U_{32}$ C5. No residual uridine could be detected in the sample after modification with RluA enzyme.


ψ32 ACSL^Phe
U32 ACSL^Phe
U32
U39
U39
6.2
5.8
5.4
5.0
1H (ppm)
ψ32 ACSL^Phe
U32 ACSL^Phe
U39
U33
U32
U39
U33
6.0
5.8
5.6
5.4
5.2
5.0
1H (ppm)
88.0
92.0
96.0
100.0
104.0
13C (ppm)