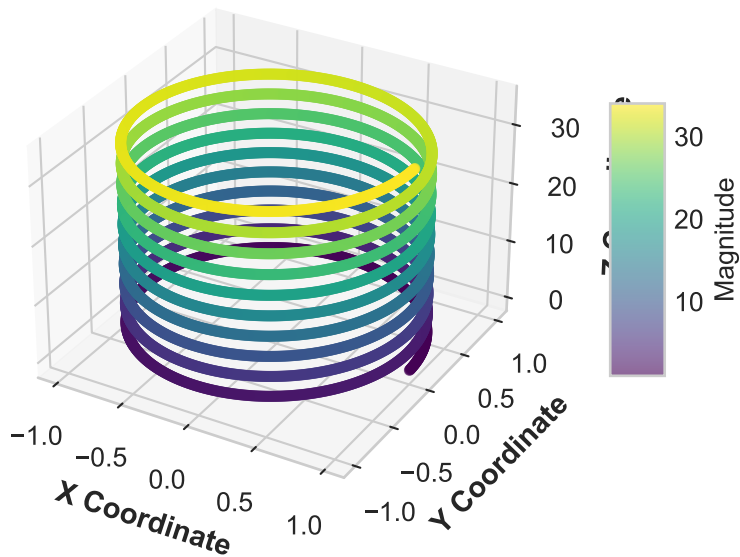
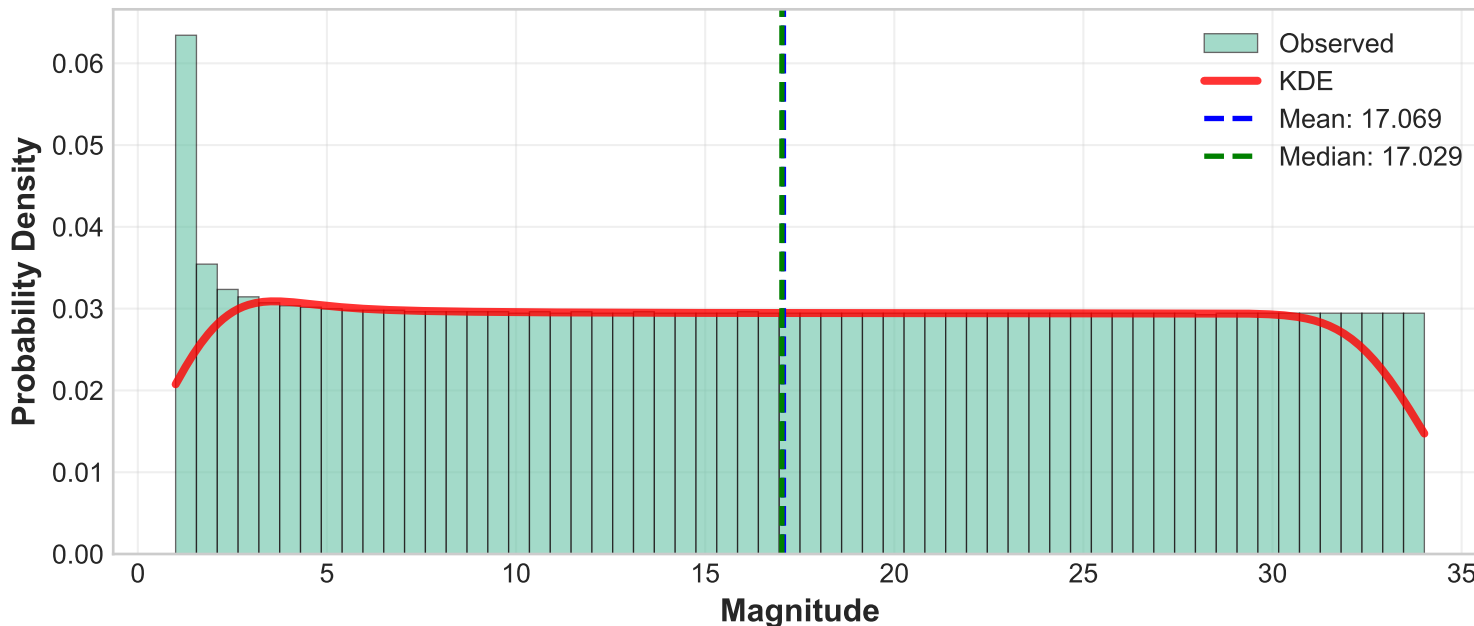


# Dual Strand Geometry Analysis: Cardinal Coordinates and Spatial Properties

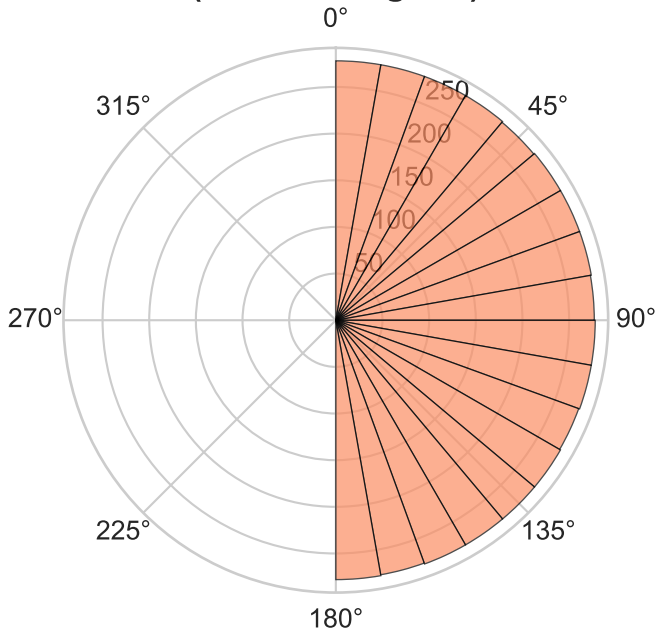
A. 3D Cardinal Coordinate Space



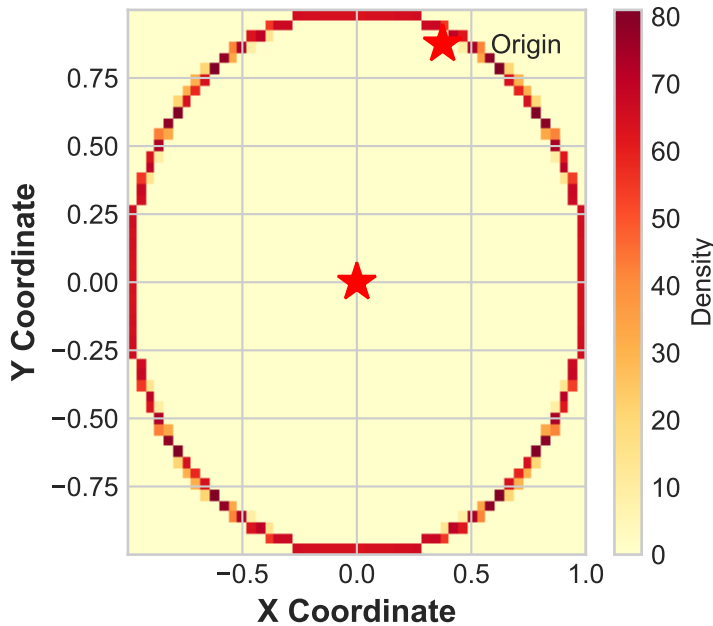
B. Vector Magnitude Distribution



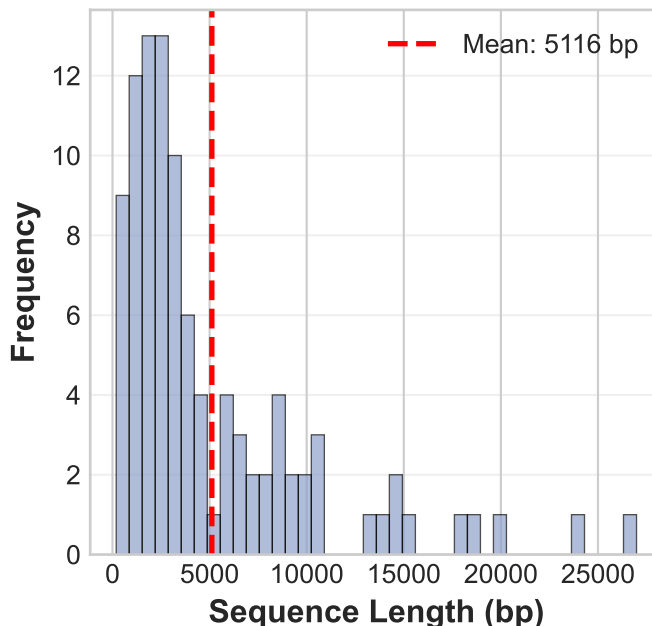
C. Angular Distribution (Polar Histogram)



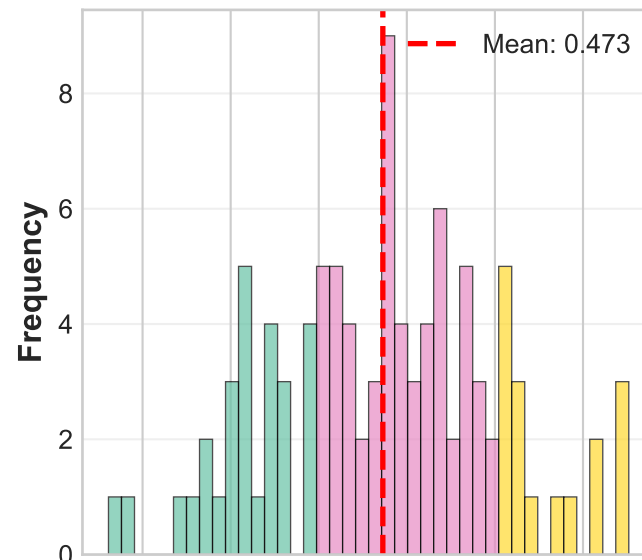
D. X-Y Coordinate Density Heatmap



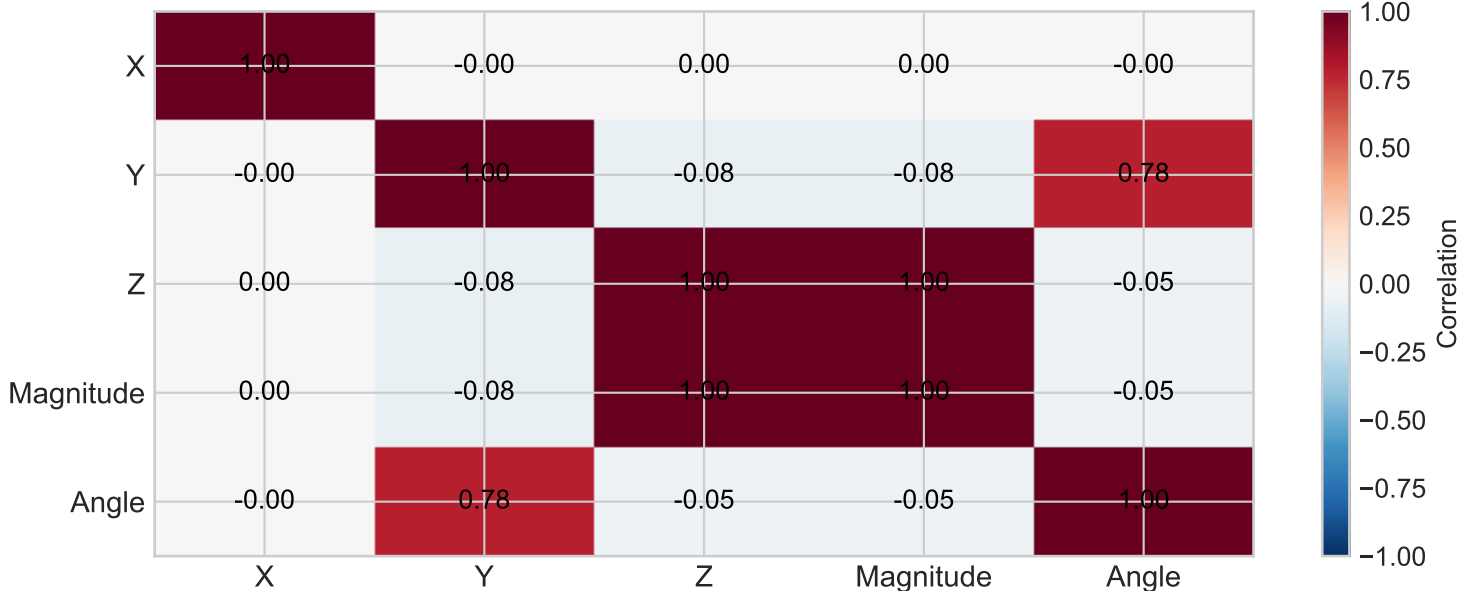
E. Sequence Length Distribution



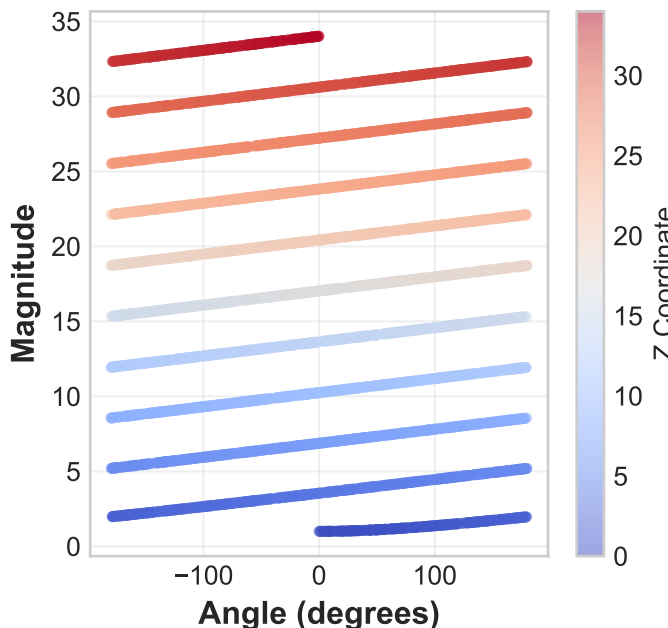
F. GC Content Distribution



G. Coordinate Correlation Matrix



H. Magnitude vs Angle (colored by Z)



Property	Value
Sequences	9
Total Coordinates	10,000
X Range	[-1.00, 1.00]
Y Range	[-1.00, 1.00]
Z Range	[0.00, 34.00]
Mean Magnitude	17.0694
Std Magnitude	9.7461
Mean Angle	0.00°
Std Angle	103.92°
Mean Seq Length	5116 bp
Mean GC Content	0.473

I. Geometric Statistics Summary