Weekly Report(Up until 14th January, 2015)

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Work Done

Up until last time, I came up with my own data set. The current task was to test my method of finding the number of domains on this new data set.

Steps

The following steps were used to calculate the number of domains.

1. Each of the chain was step-by-step split into 2 to 6 domains(using k-means).
2. For each of the split, the Interaction energy was calculated and based on the values(calculated previously) the chain was assigned the domain based on it's length and the interaction energy.

Results

Following are the results that were obtained.

	Contiguous	Non-Contiguous	Total
1 Domain Chains	575/677	-	575/677(85%)
2 Domain Chains	48/118	16/29	64/147(43.5%)
3 Domain Chains	8/28	11/23	19/51(37.25%)

As it can be clearly seen, apart from classifying single domains from multi-domains, the program performed quite poorly.