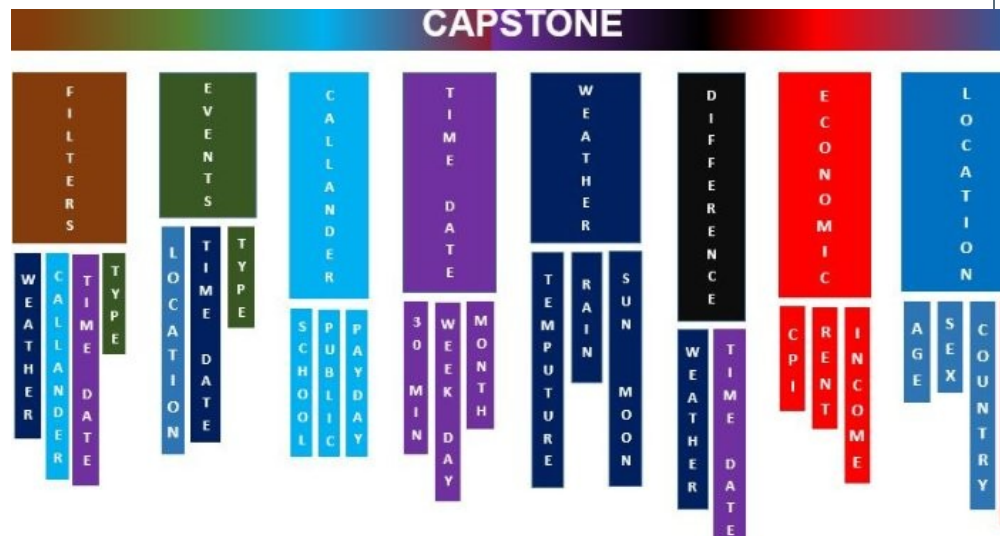




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Making Big Data simple using System of Systems

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By using a System of Systems Engineering approach, is some thing like using a model of models approach, or a dataset of datasets approach. It uses a parent / child hierarchy within a fuzzy logic framework, which also incorporates subject frameworks, peer relativity transformations and digital hash's. This breaks down Big Data sets into smaller and much more manageable sub-datasets. By linking these datasets together in a representative and meaningful way. Child datasets are be combined and compressed into digital hashes, which becomes a member of the parent dataset. This is then repeated upwards, until it reaches the capstone dataset,

Because this process is modular, when you add in cohorts (combinations of single or multiple variables), then it becomes possible to make a cohort -cluster-stratification also a system. Which gives a very powerful tool for making the capstone dataset. When you make the Capstone dataset in inclusive analytics mode rather than exclusive analytics mode, you can then use the dataset in variety of different software.

Below is a description of a project I am working on, where I am using weather, geospatial, economic, environmental, to map human events. This has applications in retail, emergency services, public administration, human services, tourism, logistics, transportation, health services, etc

This is a systems of systems approach to building an enhanced capstone dataset for identifying trends and patterns of events within big data data. Each event is matched to a subsystem of (time, calendar, environmental, geospatial, economic, demographic) data, which is represented in the form of a distance preserving digital fingerprint within a

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again using the same characteristics and mathematics of the parent data

The capstone dataset contains a number of filters based on a number of characteristics, which includes; weather forecasts, calendar, location, time segmentation, sun & moon rise/set, and some economic KPI's. These filters are a variety of different combinations across all the relative subsystems, where each representative variable is broken down into stratification's. Each stratification is with a digital hash. This allows for various analytical techniques to be applied to the capstone dataset.

As these filter variables can be forecast a few days ahead with some accuracy, this can aid in decision support about the allocation of resources and logistics. The data where possible is broken down and represented in multiple ways, so a variety of techniques or combinations are possible.

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