



### Core Systems:

1. MxChip
2. IoT Hub
3. Stream Analytics

### Sub System/Services

1. Data Lake Stg (Cold)
2. Data Lake Analytics
3. Azure Function

### Sub system Selection (Reason):

1. Data Lake Stg (DLS): The scenario required to store telemetry data for long term with ability to perform cold storage data analytics thru U-SQL queries which will require more read requests. DLS; although more expensive then blob, but it complies with Contoso Energy PoV requirements.
2. Data Lake Analytics(DLA) will facilitate on demand analytics, transform & extract valuable insights from weather station data from DLS through queries. DLA provide scalable, easy to develop and simple yet powerful U SQL query option.
3. Azure Function will trigger alert (on MxChip RGB) & action if the windspeed exceeds safe limits with device twin update