#### RESUME (CV): Naren Kamat Data Architect and Lead Data Engineer, over 20 years Design and Development at leading Investment Banks, Defense, Healthcare and Public sector service providers.

**Technical Skills:**

* **Big Data Distributions**

HDP (Hortonworks Data Platform) CDP (Cloudera Data Platform), HPE Ezmeral

* **Cloud Services**

AWS – Amazon EMR , S3, Boto3, Glue, Redshift , Athena

* **Development background - 15 years**Data Processing: Python, PySpark, Scala, Informatica, SAS DI, Pentaho Data Integrator, MS SSIS, DBT

Scripting: SQL, Bash & Korn Unix Shell, PL/SQL, Python

* **Real Time Frameworks**

Apache Kafka , MapR Streams

* Jenkins, Ansible, CyberArk & SonarCube
* **Data Modeling - 12 years**NoSQL (Document based, Column based, Key Value Store & Graph Based) Relational (OLTP, S), Dimensional (Star Schema), Conceptual (ontology)   
  Tools: ERWin, SAP PowerDesigner , SAS Enterprise Guide, Sparx Enterprise Architect
* **Databases**

PostgreSQL, MongoDB, HBase, MapR-DB Document Store, Snowflake, Oracle, SQL Server, MySQL, Snowflake

* **Visualization Tools**

Tableau, Power BI & SSRS

* **Agile Tools**

Jira, Confluence, Wiki

**INDUSTRY EXPERIENCE**

**BNP Paribas CIB: Aug 2017 – Present**

**Big Data Solutions Architect**

* Designed & implemented a scalable Data Hub, providing set of services for Investment Banking Businesses to build Data Solutions for Data Warehouse, Analytics, Data Science and Reporting needs using Big Data Architecture.
* Designed and Built an Ingestion Framework using Python and Spark to process various Data Feeds, including Batch and Real-time supporting various formats across the business lines into the Data Hub, including Metadata Management and Data Lineage.
* Architected and developed a DaaS (Data as a Service) offerings to the Bank’s Customers. Designed and Modeled Data Pipeline processing 10 billion records. Standardisation of data sets into Master Model.
* Data Models for Data Warehouse, Operational Data Sources and Timeseries using NoSQL and Timeseries Databases
* Designed and built an CCR (Counter Party Liquidity Risk) and Pricing Tool for Global Markets using Machine Learning Models.
* Designed and built Data Warehouse Data Models and ELT Routines using Snowflake and DBT
  + Worked on Snowsql to build batch and bulk load using Copy
  + Worked on Snowpipe for Realtime feeds from AWS S3
    - Designed and populated dimensional and star schema models in snowflake using DBT
* Involved in building ABOR and IBOR Solutions to both internal and external clients for Banks’s security services.
* Build a solution for offload of Historic from Operational and reporting platforms to low-cost storage.
* Built Agile DevOps CI/CD frameworks to support seamless delivery models to production.
* Designed and built Hybrid cloud platform using AWS EMR, S3, Glue, Athena and Redshift

**Bank of America: Jan 2017 – Aug 2017  
Data Architect**

Data Lake Implementation:

* Helped to build and Industrialise Data Science projects using Machine Learning Data Pipeline, involved from Design, Build & Test.
* Expertise on Underlying Infrastructure for Big Data Solutions (Clustered / Distributed Computing & Storage)
* Data Modeling and Migration of Relational Application Databases to NoSQL JSON and Key-Value Pair using MongoDB and HBase.
* Involved in Design and continuously improve performance of Hadoop / Spark based Data Pipeline solutions.
* Data Architecture and provide expertise on Real-Time analytics with HDFS, Kafka and Hortonworks Stack.
* Have built and configured HDFS with User-level and Job-level disk storage, User Security using Kerberos, SSL.
* Streamlined and developed CI/CD pipelines to industrialise Data Science and Analytics projects.
* Proof-of-concept to determine feasibility and product evaluation of Big Data products.
* Exploring with the Spark for improving the performance and optimization of the existing algorithms in Hadoop using Spark Context, Spark-SQL, Data Frame, Pair RDD's, Spark YARN.

Regulatory compliance Projects:

* Data Architecture and Data Modeling for an Operational Data Source (ODS) to support Bank’s SCV and also be a source to underlying Single Data Warehouse.
* Data Architecture included Conceptual, Logical and Physical Data Modeling, data quality assessments for a Single Data Warehouse

**Jan 2015 – Oct 2016: DWP (Department of Works and Pensions) UK**

**Data Architect and Lead Data Modeler** for DWP Digital & DWP Finance

**Finance** - UK Pensions Regulatory compliance: Comprehensive Pensions and Capital Analysis and Review (CPCAR).

* Analyzed and reviewed forms FR Y-9C, FR-Y14 data requirements
* Performed and QA-ed Data Gap Analysis to existing global Finance DW
* Re-engineered current data model into NO-SQL Model, workflows and Data Ingestion strategies using Big Data Architecture for RAW, Entity and Dimensional Layers.
* Designing warehouse model for Financial Resource Management.
* Architecting and Designing a Self-Serve BI Visualisation using QlikView and QlikSense

**Digital** – Big Data Architecture: Transforming DWP Digital Data and Analytics services into Data as a Service (DaaS) Architecture that included serving wide user base such Operational Analysts, Data Scientists, Statisticians and Ministerial Executive Board.

* Data Architecture included Conceptual, Logical and Physical Data Modeling, data quality assessments and reporting and integration, and data profiling.
* Involved in Design of Enterprise Data Lake hosted on Hadoop Ecosystem Platform.
* Data Ingestion Framework and Design and Metadata Management for all Structured and Unstructured Data Sources. .
* Designing and implementation of data rules for Fraud and Error.
* Data Modeled for new greenfield implementation of Data warehouse for a Siebel CRM system.

**Fraud and Error –** Data Science: Data Models and Data Mapping Rules and analysis

* Analyzed and created data models to support the Fraud and Error Decision Support Reporting
* Interactive data lake queries on Hadoop and Hive to support creating data sampling.
* Data Model testing and provide analysis reports.
* Predictive and Analytical models for the Data Science, Fraud and Error and Statistical community within the department

**May 2012 – December 2014: UKAR (Formerly Bradford and Bingley & Northern Rock Asset Management) UK**

**BI Solution Architect**

UKAR’s Global Asset Management Services are a main revenue provider to the group.

* + Customized Banking Data Warehouse Models for Assets under Custody, Statements, Receivables, Account Balances and Payments.
  + Created 'Kimball' Dimensional mart databases. Conformed Dimensions for Customer, Account, Branch, Currency, Transaction Types.
  + Optimized physical design for up to 1 billion row Fact tables, utilizing Oracle Bitmaps, Star Transformation and Aggregates.
  + Queried Production Data for analysis, validation and trouble shooting.
  + Created Uniform Financial Data Warehouse across both Banks (B&B and NRAM).

**September 2011 – April 2012: KPMG**

**Finance Data Warehouse Consultant** at Ministry of Defence (MOD).

Cost Analysis and Assurance Service (CAAS) provides the basis of MOD’s Centre of excellence for pricing and costing support to the Acquisition Community, enabling continuous improvement of the acquisition process, risk reduction, and ensuring ‘Best Value for Money’ for Defence.   
Consulted at more than 10 Major Projects to implement the Financial Forecasting Data Warehouse (FFDW) model to mature the various risk scenarios that could impact the cost, schedule and outputs from each procurement of through-life capability:

* + Lead data modeling for Global Performance Analytics Predictive Master model.
  + Structured business requirements and designed 120 entity conceptual data model.
  + Data modeled and implemented the data warehouse to include the Predictive estimates model with Actuals recorded from Oracle Financials.
  + Data Architecture that included enterprise and system data models and data dictionaries, reusable enterprise domains and common objects, standard terms and abbreviations, and framework for Master Data.
  + Data Warehouse includes architecture, tool/component integration, and life cycle management with strong emphasis on methodology, processes, product interchangeability, and data reuse. Experience includes component architecture, data design and modeling relational and multi-dimensional, ETL, data cleansing, data integration, data mart/ analytics infrastructure and design, and metadata integration.
* **Leading guidance and review for Oracle E-business Financial Management implementation.**
  + Financial Business Process Model (FBPM) and new Financial Data Warehouse (FDW) data model
  + Annual FBPM/FDW Releases for regulatory compliance

**2010, 2011: Serco**

**Data Architecture and delivered functional & technical solution architecture for Transport for London (TFL).**

* Strategic Data warehouse and Reporting Project to build a Corporate Decision support system to help the executive Managers to analyze the performance of the London Transport based on various Key Performance Metrics.
  + Data Modeled Enterprise warehouse and lead the team of 10 ETL developers for building a robust Data pipelines.
  + Developed customized department’s relational data model for capital calculation (80 entities) and dimensional model for regulatory reporting (50 entities).
  + Developed Data Strategy, Metadata and Master Data Management functions and also implementing tools to support these functions.

**April 2008 – March 2010 BT Global Service – Healthcare**

**Data Architect** design and improvement of the clients global database systems in an environment of over 200 databases and 12000 tables.

* Oversaw full lifecycle data management for structured and unstructured data from creation, storage, quality, integration, risk management to business intelligence and processes.
* Maintained data for analysis and interpretation of clinical trials.
* Created and reviewed data warehouse applications design, build, and test plans to ensure they met the functional and technical design specifications using industry standards and established methodology.
* **Data modeled more than 10 large data warehouses consisting of more than 300 star schemas.**  
  30 new databases of up to 80 tables; implemented redesign/changes/additions on more than 90 existing database systems. Designed operational (normalized) systems as well as DSS reporting systems (Data Warehouse/Star Schema).
* Perform Data Profiling and Analysis of Source Systems. Provide data exception reports showing critical violations of data/business rules. Assess Data quality & conformance issues internal source systems and the newly acquired data flows. Determination of cleansing strategy based on the Data Quality Assessment
  + ETL architecture – Prepare Data Flow diagrams, identify major streams like Data Conversion, Historical, Data Retention Archival, Data Quality, Reconciliation

#### October 2007 – April 2008: Accenture Consulting (Client: BAE Systems) Data and ETL Architect for Engineering Data Visibility (EDV) for the data received from LITS and MJDI for Tornado and Harrier CFBU platforms.

**August 2004 – September 2007: Mastek UK Ltd.**Data Architect, Senior Data Modeler and BI Technical Lead on a major medical Information Data warehouse for NHS Secondary Users Services serving UK Government’s efficiency initiatives such Payment by Results (PbR), Referral to Treatment (RTT), Hospital Episode Statistics (HES).

**June 2002 – July 2004: Hewlett Packard**Data Warehouse Developer and DBA in a highly commercial sensitive project to provide Logistics Customs and Licensing system with value adding functionality and a Self-Serve reporting system using SAP BO for HP Global trade.

**August 1999 – May 2002: Total InfoTech Ltd.**Database Developer developed accounting and statistic programs in largest national booking system for concert tickets and the EXPO 2000

**October 1998 - May 1999: CAE Systems and Software’s Ltd.**Programmer Analyst (Employee) designed and developed automatic call analysis and reporting systems.

**EDUCATION**October 1993 - April 1997: Karnataka University, Major: Statistics, Minor: Economics