# Artifact #4: Product and Sprint Backlog

## PROJECT WORKING BACKGROUND

Before diving into the product and sprint backlog, here is a brief description of how TRENDS works. We already know that TRENDS is a software analytics platform that provides users/customers with analysis and insights into their business questions. It is more like an automated working model of Tableau or Power Bi. The user can simply upload their data files and type their queries to get an auto-generated analysis report. When a file is uploaded, it should identify the data and date formats in all the columns, and identify columns that can be metrics, dimensions, and filters. When a user types their query, the platform should retrieve relevant keywords that can be mapped to the metrics and dimensions identified from the data and perform request analysis and display appropriate visualization to the user. Since we are focussing on the development side of this project, all the backlogs are related to development/technical aspects.

#### Few Assumptions:

- Priority Range: Critical, High, Medium, Low
- Story Size
  - Granular range/Story points: 1, 3, 5, 8, 10 (with 10 being highest)
  - Story size/ T-shirt sizes: S, M, L, XL (with XL being large in size)
- Status: To be Started, In Progress, Done
- Estimate in Sprint Backlog is in Hours (assuming employee works 8 hours a day)

### PRODUCT BACKLOG

Story ID	Story Name	User Story	Story Size	Priority	Status
BL01	Database Architect Design	As a Data Engineer, I want to design and develop the product database architecture, so that I can store and manage the data	10	Critical	Done
BL02	Auto Detect Data & Date Formats	As a Senior Developer, I want to build "Auto-Detect" feature for the software, so that it can identify the data and date formats in the uploaded files	8	High	In Progress
BL03	User Query Processing	As a Developer, I want to process user input/query, so that I can extract the keywords and map them with the trained data	8	High	In Progress

BL04	Data Processing & Training	As a Developer, I want to segregate the data into categorical and numerical, so that the product can be trained with metrics and dimensions in the data	8	High	In Progress
BL05	File Upload	As a Developer, I want to build an "Upload" feature so that user can upload a file of any format like .txt, .docx, .csv, etc,	5	High	Done
BL06	Progress Tracking	As a Project Manager, I want to collaborate, track and review the progress with the team, so that the project is on track, meeting client requirements	8	High	In Progress
BL07	Integration	As a Senior Developer, I want to integrate the back-end and front-end, so that I can perform end-end testing	XL	High	To be Started
BL08	Review Meets	As a Project Sponsor, I want to conduct review meetings, so that I can understand the project schedule and budget	S	Medium	In Progress
BL09	Visualizations	As a Front-end Developer, I want to build an interactive UI page, so that I can provide visualizations of the analysis	l an interactive UI page, that I can provide		To be Started
BL10	Login Page	As a Front-end Developer, I want to design a login page, so that users can log into the platform using their credentials	S	Low	Done

## SPRINT BACKLOG

Product Backlog Story	Acceptance Criteria	Tasks	Assigned to	Estimate (Hours)	Status
Database Architect Design	<ol> <li>All entities and relations are included</li> </ol>	Explore the database technology stack	Data Engineer	12	Done

	<ul><li>2. Should follow database normalization</li><li>3. Establish database</li></ul>	Determine the relations, tables, constraints & schema	Data Engineer	10	Done
	security by defining user groups 4. Successful data flow and storage	Provide database access to the individual user groups	Developer	3	In Progress
Auto Detect Data & Date Formats	<ol> <li>Successfully identifying all the data types for all columns in file</li> </ol>	Explore all different types of data and date formats	Data Analyst	8	Done
	2. Should be able to correctly identify different types of date formats like dd/mm/yy,	Develop a program to detect the explored data types in the input data file	Developer	32	In Progress
	dd/mm/yyyy, etc,	Test the model with different possible test data files	Developer	14	To be Started
User Query Processing	<ol> <li>Provide for and store user queries</li> <li>Successfully identify all</li> </ol>	Collect frequently used user keywords	Data Analyst	10	Done
	relevant keywords in the user input 3. Should also able to	Develop UI for user input	Front-end Developer	12	Done
	correctly identify and map synonyms	Extract relevant keywords from input and identify metrics, dimensions, filters, and functions	Developer	40	In Progress
		Test the model with different possible keywords	Developer	16	To be Started