Funnel Analysis - DataTech Case

## **Get Started**

Datatech, an edtech company, is analyzing its student enrollment funnel to assess the effectiveness of course completion. The goal is to identify stages where students are dropping off and to enhance the course structure to improve completion rates

## **Objective**

**Drop-out Rate Analysis:** The company wants to see which student backgrounds have the highest drop-out rates to identify where improvements are needed.

**Student Progress Analysis:** The company seeks to analyze student progress through various stages of the course to understand the time spent and pinpoint areas needing improvement for better course completion rates.

## **Data**

The data provided covers student enrollments for which initial enrollment occurred on 8th November 2023. The students' interactions and progress were last recorded on 15th November 2023. This information includes details about student enrollment and their progression through various stages of the course, with a focus on students from BTech. and BCom backgrounds.

**Student Interaction Details:** The dataset tracks student progress from enrollment on 8th November 2023 through various stages.

**Student Progress Tracker:** This dataset records the progression of students through different stages of a course, from enrollment to completion, detailing their dates of advancement.

Student Category: This dataset provides information on the educational background of each student.

Funnel Analysis - DataTech Student Interaction Details

StudentID	Activity Timestamp	Stage
20101	08/11/2023	Enrolled
20102	08/11/2023	Enrolled
20103	08/11/2023	Enrolled
20104	08/11/2023	Enrolled
20105	08/11/2023	Enrolled
20106	08/11/2023	Enrolled
20107	08/11/2023	Enrolled
20108	08/11/2023	Enrolled
20109	08/11/2023	Enrolled
20110	08/11/2023	Enrolled
20111	08/11/2023	Enrolled
20112	08/11/2023	Enrolled
20113	08/11/2023	Enrolled
20114	08/11/2023	Enrolled
20115	08/11/2023	Enrolled
20116	08/11/2023	Enrolled
20117	08/11/2023	Enrolled
20118	08/11/2023	Enrolled
20119	08/11/2023	Enrolled
20120	08/11/2023	Enrolled
20121	08/11/2023	Enrolled
20122	08/11/2023	Enrolled
20123	08/11/2023	Enrolled
20124	08/11/2023	Enrolled
20125	08/11/2023	Enrolled
20126	08/11/2023	Enrolled
20127	08/11/2023	Enrolled
20128	08/11/2023	Enrolled

Funnel Analysis - DataTech Student Interaction Details

20129	08/11/2023	Enrolled
20130	08/11/2023	Enrolled
20101	11/11/2023	Level1
20102	09/11/2023	Level1
20103	10/11/2023	Level1
20104	13/11/2023	Level1
20105	10/11/2023	Level1
20106	09/11/2023	Level1
20108	12/11/2023	Level1
20111	10/11/2023	Level1
20113	12/11/2023	Level1
20114	11/11/2023	Level1
20117	11/11/2023	Level1
20118	11/11/2023	Level1
20120	12/11/2023	Level1
20121	12/11/2023	Level1
20122	10/11/2023	Level1
20129	10/11/2023	Level1
20101	13/11/2023	Level2
20102	11/11/2023	Level2
20103	12/11/2023	Level2
20104	15/11/2023	Level2
20108	14/11/2023	Level2
20113	13/11/2023	Level2
20117	14/11/2023	Level2
20118	12/11/2023	Level2
20120	13/11/2023	Level2
20121	14/11/2023	Level2
20101	17/11/2023	Course Completed
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Funnel Analysis - DataTech Student Interaction Details

20103	16/11/2023	Course Completed
20104	20/11/2023	Course Completed
20108	18/11/2023	Course Completed
20117	19/11/2023	Course Completed
20120	17/11/2023	Course Completed
20121	19/11/2023	Course Completed

Funnel Analysis - DataTech Student Progress Tracker

StudentID	Enrolled	Level1	Level2	Course Completed
20101	08/11/2023	11/11/2023	13/11/2023	17/11/2023
20102	08/11/2023	09/11/2023	11/11/2023	
20103	08/11/2023	10/11/2023	12/11/2023	16/11/2023
20104	08/11/2023	13/11/2023	15/11/2023	20/11/2023
20105	08/11/2023	10/11/2023		
20106	08/11/2023	09/11/2023		
20107	08/11/2023			
20108	08/11/2023	12/11/2023	14/11/2023	18/11/2023
20109	08/11/2023			
20110	08/11/2023			
20111	08/11/2023	10/11/2023		
20112	08/11/2023			
20113	08/11/2023	12/11/2023	13/11/2023	
20114	08/11/2023	11/11/2023		
20115	08/11/2023			
20116	08/11/2023			
20117	08/11/2023	11/11/2023	14/11/2023	19/11/2023
20118	08/11/2023	11/11/2023	12/11/2023	
20119	08/11/2023			
20120	08/11/2023	12/11/2023	13/11/2023	17/11/2023
20121	08/11/2023	12/11/2023	14/11/2023	19/11/2023
20122	08/11/2023	10/11/2023		
20123	08/11/2023			
20124	08/11/2023			
20125	08/11/2023			
20126	08/11/2023			
20127	08/11/2023			
20128	08/11/2023			

Funnel Analysis - DataTech Student Progress Tracker

20129	08/11/2023	10/11/2023	
20130	08/11/2023		

Funnel Analysis - DataTech Student Category

StudentID	Background
20101	BTech.
20102	BTech.
20103	BTech.
20104	BTech.
20105	BTech.
20106	BTech.
20107	BCom
20108	BTech.
20109	BTech.
20110	BTech.
20111	BTech.
20112	BCom
20113	BCom
20114	BCom
20115	BTech.
20116	BTech.
20117	BCom
20118	BTech.
20119	BTech.
20120	BTech.
20121	BCom
20122	BTech.
20123	BCom
20124	BTech.
20125	BCom
20126	BTech.
20127	BCom
20128	BTech.

Funnel Analysis - DataTech Student Category

20129	BTech.
20130	BCom
20101	BTech.
20108	BTech.
20111	BTech.
20112	BCom
20113	BCom
20114	BCom
20117	BCom
20118	BTech.
20120	BTech.
20121	BCom
20122	BTech.
20129	BTech.
20101	BTech.
20108	BTech.
20112	BCom
20113	BCom
20117	BCom
20118	BTech.
20120	BTech.
20121	BCom
20122	BTech.
20101	BTech.
20113	BCom
20117	BCom
20118	BTech.
20120	BTech.
20121	BCom

Funnel Analysis - DataTech Student Category

20122 BTech.

Funnel Analysis - DataTech Student Categorised

StudentID	Activity Timestamp	Stage	Background
20101	08/11/2023	Enrolled	BTech.
20102	08/11/2023	Enrolled	BTech.
20103	08/11/2023	Enrolled	BTech.
20104	08/11/2023	Enrolled	BTech.
20105	08/11/2023	Enrolled	BTech.
20106	08/11/2023	Enrolled	BTech.
20107	08/11/2023	Enrolled	BCom
20108	08/11/2023	Enrolled	BTech.
20109	08/11/2023	Enrolled	BTech.
20110	08/11/2023	Enrolled	BTech.
20111	08/11/2023	Enrolled	BTech.
20112	08/11/2023	Enrolled	BCom
20113	08/11/2023	Enrolled	BCom
20114	08/11/2023	Enrolled	BCom
20115	08/11/2023	Enrolled	BTech.
20116	08/11/2023	Enrolled	BTech.
20117	08/11/2023	Enrolled	BCom
20118	08/11/2023	Enrolled	BTech.
20119	08/11/2023	Enrolled	BTech.
20120	08/11/2023	Enrolled	BTech.
20121	08/11/2023	Enrolled	BCom
20122	08/11/2023	Enrolled	BTech.
20123	08/11/2023	Enrolled	BCom
20124	08/11/2023	Enrolled	BTech.
20125	08/11/2023	Enrolled	BCom
20126	08/11/2023	Enrolled	BTech.
20127	08/11/2023	Enrolled	BCom
20128	08/11/2023	Enrolled	BTech.

Funnel Analysis - DataTech Student Categorised

20129   08/11/2023   Enrolled   BTech.				
20101	20129	08/11/2023	Enrolled	BTech.
20102	20130	08/11/2023	Enrolled	BCom
20103	20101	11/11/2023	Level1	BTech.
20104   13/11/2023   Level1   BTech.	20102	09/11/2023	Level1	BTech.
20105       10/11/2023       Level1       BTech.         20106       09/11/2023       Level1       BTech.         20108       12/11/2023       Level1       BTech.         20111       10/11/2023       Level1       BTech.         20113       12/11/2023       Level1       BCom         20114       11/11/2023       Level1       BCom         20117       11/11/2023       Level1       BCom         20118       11/11/2023       Level1       BTech.         20120       12/11/2023       Level1       BCom         20121       12/11/2023       Level1       BCom         20122       10/11/2023       Level1       BTech.         20129       10/11/2023       Level1       BTech.         20101       13/11/2023       Level2       BTech.         20102       11/11/2023       Level2       BTech.         20103       12/11/2023       Level2       BTech.         20104       15/11/2023       Level2       BTech.         20108       14/11/2023       Level2       BCom         20119       12/11/2023       Level2       BCom         20110       13/11/2023       Le	20103	10/11/2023	Level1	BTech.
20106       09/11/2023       Level1       BTech.         20108       12/11/2023       Level1       BTech.         20111       10/11/2023       Level1       BTech.         20113       12/11/2023       Level1       BCom         20114       11/11/2023       Level1       BCom         20117       11/11/2023       Level1       BCom         20118       11/11/2023       Level1       BTech.         20120       12/11/2023       Level1       BTech.         20121       12/11/2023       Level1       BTech.         20122       10/11/2023       Level1       BTech.         20129       10/11/2023       Level2       BTech.         20101       13/11/2023       Level2       BTech.         20102       11/11/2023       Level2       BTech.         20103       12/11/2023       Level2       BTech.         20104       15/11/2023       Level2       BTech.         20108       14/11/2023       Level2       BCom         20113       13/11/2023       Level2       BCom         20116       12/11/2023       Level2       BTech.         20120       13/11/2023 <t< td=""><td>20104</td><td>13/11/2023</td><td>Level1</td><td>BTech.</td></t<>	20104	13/11/2023	Level1	BTech.
20108       12/11/2023       Level1       BTech.         20111       10/11/2023       Level1       BTech.         20113       12/11/2023       Level1       BCom         20114       11/11/2023       Level1       BCom         20117       11/11/2023       Level1       BCom         20118       11/11/2023       Level1       BTech.         20120       12/11/2023       Level1       BTech.         20121       12/11/2023       Level1       BTech.         20122       10/11/2023       Level1       BTech.         20129       10/11/2023       Level1       BTech.         20101       13/11/2023       Level2       BTech.         20102       11/11/2023       Level2       BTech.         20103       12/11/2023       Level2       BTech.         20104       15/11/2023       Level2       BTech.         20108       14/11/2023       Level2       BCom         20113       13/11/2023       Level2       BCom         20116       12/11/2023       Level2       BTech.         20120       13/11/2023       Level2       BTech.         20121       14/11/2023 <t< td=""><td>20105</td><td>10/11/2023</td><td>Level1</td><td>BTech.</td></t<>	20105	10/11/2023	Level1	BTech.
20111       10/11/2023       Level1       BTech.         20113       12/11/2023       Level1       BCom         20114       11/11/2023       Level1       BCom         20117       11/11/2023       Level1       BCom         20118       11/11/2023       Level1       BTech.         20120       12/11/2023       Level1       BTech.         20121       12/11/2023       Level1       BCom         20122       10/11/2023       Level1       BTech.         20129       10/11/2023       Level1       BTech.         20101       13/11/2023       Level2       BTech.         20102       11/11/2023       Level2       BTech.         20103       12/11/2023       Level2       BTech.         20104       15/11/2023       Level2       BTech.         20108       14/11/2023       Level2       BTech.         20113       13/11/2023       Level2       BCom         20117       14/11/2023       Level2       BCom         20118       12/11/2023       Level2       BTech.         20120       13/11/2023       Level2       BTech.         20121       14/11/2023	20106	09/11/2023	Level1	BTech.
20113       12/11/2023       Level1       BCom         20114       11/11/2023       Level1       BCom         20117       11/11/2023       Level1       BCom         20118       11/11/2023       Level1       BTech.         20120       12/11/2023       Level1       BTech.         20121       12/11/2023       Level1       BCom         20122       10/11/2023       Level1       BTech.         20129       10/11/2023       Level1       BTech.         20101       13/11/2023       Level2       BTech.         20102       11/11/2023       Level2       BTech.         20103       12/11/2023       Level2       BTech.         20104       15/11/2023       Level2       BTech.         20108       14/11/2023       Level2       BTech.         20113       13/11/2023       Level2       BCom         20117       14/11/2023       Level2       BCom         20118       12/11/2023       Level2       BTech.         20120       13/11/2023       Level2       BTech.         20121       14/11/2023       Level2       BTech.	20108	12/11/2023	Level1	BTech.
20114       11/11/2023       Level1       BCom         20117       11/11/2023       Level1       BCom         20118       11/11/2023       Level1       BTech.         20120       12/11/2023       Level1       BTech.         20121       12/11/2023       Level1       BCom         20122       10/11/2023       Level1       BTech.         20129       10/11/2023       Level1       BTech.         20101       13/11/2023       Level2       BTech.         20102       11/11/2023       Level2       BTech.         20103       12/11/2023       Level2       BTech.         20104       15/11/2023       Level2       BTech.         20108       14/11/2023       Level2       BTech.         20113       13/11/2023       Level2       BCom         20117       14/11/2023       Level2       BCom         20118       12/11/2023       Level2       BTech.         20120       13/11/2023       Level2       BTech.         20121       14/11/2023       Level2       BTech.	20111	10/11/2023	Level1	BTech.
20117       11/11/2023       Level1       BCom         20118       11/11/2023       Level1       BTech.         20120       12/11/2023       Level1       BTech.         20121       12/11/2023       Level1       BCom         20122       10/11/2023       Level1       BTech.         20129       10/11/2023       Level1       BTech.         20101       13/11/2023       Level2       BTech.         20102       11/11/2023       Level2       BTech.         20103       12/11/2023       Level2       BTech.         20104       15/11/2023       Level2       BTech.         20108       14/11/2023       Level2       BCom         20113       13/11/2023       Level2       BCom         20117       14/11/2023       Level2       BCom         20118       12/11/2023       Level2       BTech.         20120       13/11/2023       Level2       BTech.         20121       14/11/2023       Level2       BCom	20113	12/11/2023	Level1	BCom
20118       11/11/2023       Level1       BTech.         20120       12/11/2023       Level1       BTech.         20121       12/11/2023       Level1       BCom         20122       10/11/2023       Level1       BTech.         20129       10/11/2023       Level1       BTech.         20101       13/11/2023       Level2       BTech.         20102       11/11/2023       Level2       BTech.         20103       12/11/2023       Level2       BTech.         20104       15/11/2023       Level2       BTech.         20108       14/11/2023       Level2       BCom         20113       13/11/2023       Level2       BCom         20117       14/11/2023       Level2       BTech.         20118       12/11/2023       Level2       BTech.         20120       13/11/2023       Level2       BTech.         20121       14/11/2023       Level2       BTech.	20114	11/11/2023	Level1	BCom
20120       12/11/2023       Level1       BTech.         20121       12/11/2023       Level1       BCom         20122       10/11/2023       Level1       BTech.         20129       10/11/2023       Level1       BTech.         20101       13/11/2023       Level2       BTech.         20102       11/11/2023       Level2       BTech.         20103       12/11/2023       Level2       BTech.         20104       15/11/2023       Level2       BTech.         20108       14/11/2023       Level2       BCom         20113       13/11/2023       Level2       BCom         20117       14/11/2023       Level2       BTech.         20118       12/11/2023       Level2       BTech.         20120       13/11/2023       Level2       BTech.         20121       14/11/2023       Level2       BTech.	20117	11/11/2023	Level1	BCom
20121       12/11/2023       Level1       BCom         20122       10/11/2023       Level1       BTech.         20129       10/11/2023       Level1       BTech.         20101       13/11/2023       Level2       BTech.         20102       11/11/2023       Level2       BTech.         20103       12/11/2023       Level2       BTech.         20104       15/11/2023       Level2       BTech.         20108       14/11/2023       Level2       BCom         20113       13/11/2023       Level2       BCom         20117       14/11/2023       Level2       BTech.         20120       13/11/2023       Level2       BTech.         20121       14/11/2023       Level2       BCom	20118	11/11/2023	Level1	BTech.
20122       10/11/2023 Level1       BTech.         20129       10/11/2023 Level1       BTech.         20101       13/11/2023 Level2       BTech.         20102       11/11/2023 Level2       BTech.         20103       12/11/2023 Level2       BTech.         20104       15/11/2023 Level2       BTech.         20108       14/11/2023 Level2       BTech.         20113       13/11/2023 Level2       BCom         20117       14/11/2023 Level2       BCom         20118       12/11/2023 Level2       BTech.         20120       13/11/2023 Level2       BTech.         20121       14/11/2023 Level2       BCom	20120	12/11/2023	Level1	BTech.
20129       10/11/2023       Level1       BTech.         20101       13/11/2023       Level2       BTech.         20102       11/11/2023       Level2       BTech.         20103       12/11/2023       Level2       BTech.         20104       15/11/2023       Level2       BTech.         20108       14/11/2023       Level2       BTech.         20113       13/11/2023       Level2       BCom         20117       14/11/2023       Level2       BCom         20118       12/11/2023       Level2       BTech.         20120       13/11/2023       Level2       BTech.         20121       14/11/2023       Level2       BCom	20121	12/11/2023	Level1	BCom
20101       13/11/2023       Level2       BTech.         20102       11/11/2023       Level2       BTech.         20103       12/11/2023       Level2       BTech.         20104       15/11/2023       Level2       BTech.         20108       14/11/2023       Level2       BTech.         20113       13/11/2023       Level2       BCom         20117       14/11/2023       Level2       BCom         20118       12/11/2023       Level2       BTech.         20120       13/11/2023       Level2       BTech.         20121       14/11/2023       Level2       BCom	20122	10/11/2023	Level1	BTech.
20102       11/11/2023       Level2       BTech.         20103       12/11/2023       Level2       BTech.         20104       15/11/2023       Level2       BTech.         20108       14/11/2023       Level2       BTech.         20113       13/11/2023       Level2       BCom         20117       14/11/2023       Level2       BCom         20118       12/11/2023       Level2       BTech.         20120       13/11/2023       Level2       BTech.         20121       14/11/2023       Level2       BCom	20129	10/11/2023	Level1	BTech.
20103       12/11/2023       Level2       BTech.         20104       15/11/2023       Level2       BTech.         20108       14/11/2023       Level2       BTech.         20113       13/11/2023       Level2       BCom         20117       14/11/2023       Level2       BCom         20118       12/11/2023       Level2       BTech.         20120       13/11/2023       Level2       BTech.         20121       14/11/2023       Level2       BCom	20101	13/11/2023	Level2	BTech.
20104       15/11/2023       Level2       BTech.         20108       14/11/2023       Level2       BTech.         20113       13/11/2023       Level2       BCom         20117       14/11/2023       Level2       BCom         20118       12/11/2023       Level2       BTech.         20120       13/11/2023       Level2       BTech.         20121       14/11/2023       Level2       BCom	20102	11/11/2023	Level2	BTech.
20108       14/11/2023       Level2       BTech.         20113       13/11/2023       Level2       BCom         20117       14/11/2023       Level2       BCom         20118       12/11/2023       Level2       BTech.         20120       13/11/2023       Level2       BTech.         20121       14/11/2023       Level2       BCom	20103	12/11/2023	Level2	BTech.
20113       13/11/2023       Level2       BCom         20117       14/11/2023       Level2       BCom         20118       12/11/2023       Level2       BTech.         20120       13/11/2023       Level2       BTech.         20121       14/11/2023       Level2       BCom	20104	15/11/2023	Level2	BTech.
20117       14/11/2023 Level2       BCom         20118       12/11/2023 Level2       BTech.         20120       13/11/2023 Level2       BTech.         20121       14/11/2023 Level2       BCom	20108	14/11/2023	Level2	BTech.
20118       12/11/2023       Level2       BTech.         20120       13/11/2023       Level2       BTech.         20121       14/11/2023       Level2       BCom	20113	13/11/2023	Level2	BCom
20120       13/11/2023       Level2       BTech.         20121       14/11/2023       Level2       BCom	20117	14/11/2023	Level2	BCom
20121 14/11/2023 Level2 BCom	20118	12/11/2023	Level2	BTech.
	20120	13/11/2023	Level2	BTech.
20101 17/11/2023 Course Completed BTech.	20121	14/11/2023	Level2	BCom
<u> </u>	20101	17/11/2023	Course Completed	BTech.

Funnel Analysis - DataTech Student Categorised

20103	16/11/2023	Course Completed	BTech.
20104	20/11/2023	Course Completed	BTech.
20108	18/11/2023	Course Completed	BTech.
20117	19/11/2023	Course Completed	BCom
20120	17/11/2023	Course Completed	BTech.
20121	19/11/2023	Course Completed	BCom

Funnel Analysis - DataTech Completion Time

	Student Activity Data			Time spent in each Stage by the Student				
StudentID	Enrolled	Level1	Level2	Course Completed	Level1	Level2	Course Completed	Background
2010	1 08/11/2023	11/11/2023	13/11/2023	17/11/2023	3	2	4	BTech.
2010	2 08/11/2023	09/11/2023	11/11/2023		1	2		BTech.
2010	3 08/11/2023	10/11/2023	12/11/2023	16/11/2023	2	2	4	BTech.
2010	4 08/11/2023	13/11/2023	15/11/2023	20/11/2023	5	2	5	BTech.
2010	5 08/11/2023	10/11/2023			2			BTech.
2010	6 08/11/2023	09/11/2023			1			BTech.
2010	7 08/11/2023							BCom
2010	8 08/11/2023	12/11/2023	14/11/2023	18/11/2023	4	2	4	BTech.
2010	9 08/11/2023							BTech.
2011	08/11/2023							BTech.
2011	1 08/11/2023	10/11/2023			2			BTech.
2011	2 08/11/2023							BCom
2011	3 08/11/2023	12/11/2023	13/11/2023		4	1		BCom
2011	4 08/11/2023	11/11/2023			3			BCom
2011	5 08/11/2023							BTech.
2011	6 08/11/2023							BTech.
2011	7 08/11/2023	11/11/2023	14/11/2023	19/11/2023	3	3	5	BCom
2011	8 08/11/2023	11/11/2023	12/11/2023		3	1		BTech.
2011	9 08/11/2023							BTech.
2012	08/11/2023	12/11/2023	13/11/2023	17/11/2023	4	1	4	BTech.
2012	1 08/11/2023	12/11/2023	14/11/2023	19/11/2023	4	2	5	BCom
2012	2 08/11/2023	10/11/2023			2			BTech.
2012	3 08/11/2023							BCom
2012	4 08/11/2023							BTech.
2012	5 08/11/2023							BCom
2012	6 08/11/2023							BTech.
2012	7 08/11/2023							BCom
2012	8 08/11/2023							BTech.
2012	9 08/11/2023	10/11/2023			2			BTech.
2013	0 08/11/2023							BCom

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Funnel Analysis - DataTech Exploratory Analysis

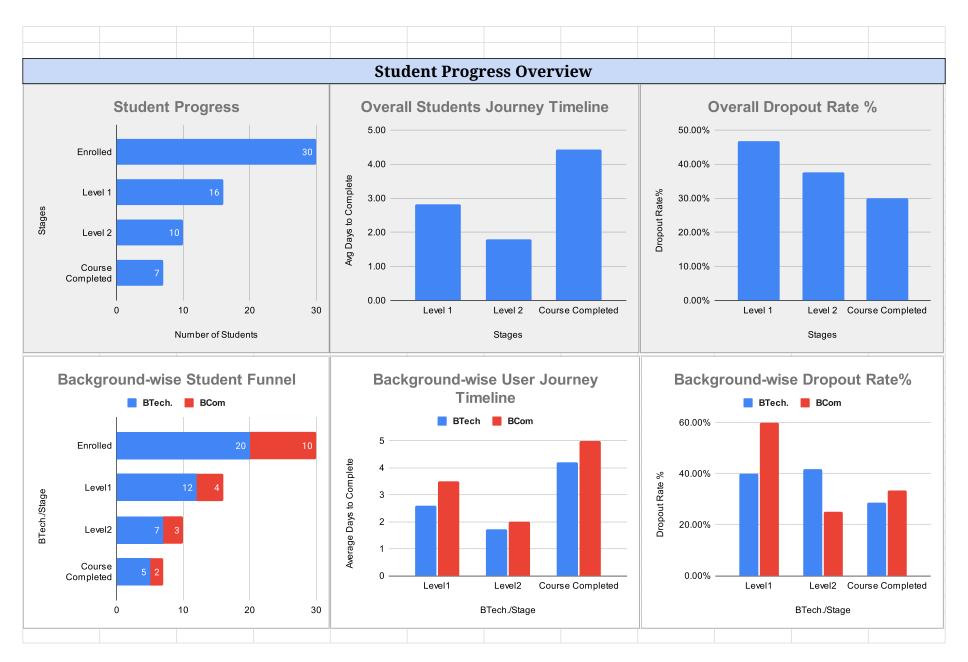
Student Interaction	Overview
Number of Unique Students	30
Last Interaction Date	20/11/2023
First Interaction Date	08/11/2023
Number of Funnel Stages	4

Funnel Analysis - DataTech Student Progress Analysis

Student Progress and Dropout Analysis							
Stages	Number of Students	Dropout Rate%	Avg Days to Complete				
Enrolled	30						
Level 1	16	46.67%	2.81				
Level 2	10	37.50%	1.80				
Course Completed	7	30.00%	4.43				

Background-wise Student Progress and Dropout Analysis								
BTech.			BCom					
Stage	Number of Student	Dropout Rate%	Average Days to Complete	Stages	Number of Student	Dropout Rate%	Average Days to Complete	
Enrolled	20			Enrolled	10			
Level1	12	40.00%	2.58	Level1	4	60.00%	3.50	
Level2	7	41.67%	1.71	Level2	3	25.00%	2.00	
Course Completed	5	28.57%	4.20	Course Completed	2	33.33%	5.00	

Funnel Analysis - DataTech Student Progress Dashboard



Funnel Analysis - DataTech Insights

Insights from Analysis				Report for Management							
Overall Funnel Analysis			1	23.33% of all st	udents who enro	lled in the cours	e have completed it.				
	All Students	BTech.	BCom	2	BTech students	BTech students have higher completion rate at 25.00%, compared to 20.00% for BCom students.					
Completion Rate	23.33%	25.00%	20.00%	3	BTech students complete the course in an average of 8.50 days, whereas BCom students take longer, averaging 10.50 days						50 days
Average Days to Complete	9.04	8.50	10.50								