



## **Model Development Phase Template**

Date	15 July 2024
Team ID	739962
Project Title	One year life expectancy post on Thoracic Surgery using machine learning
Maximum Marks	5 Marks

## **Feature Selection Report Template**

In the forthcoming update, each feature will be accompanied by a brief description. Users will indicate whether it's selected or not, providing reasoning for their decision. This process will streamline decision-making and enhance transparency in feature selection.

Feature	Description	Selected (Yes/No)	Reasoning
Diagnosis	Type of diagnosis	Yes	For predicting the life expectancy diagnosis is not required.

FVC	Patient lung test	Yes	Relevant for lung function test potential bias in patient life expectancy
Performance	Status of the Patient	Yes 	status can impact on life expectancy.
Pain	presence or absence of pain	Yes	Indicates patients respiratory and Lung capacity.

Haemoptysis	Coughing up blood	Yes	The presence or absence of coughing up blood.
Dyspnea	Difficulty in breathing	Yes	The presence or absence of difficulty in breathing.
Cough	Coughing	Yes	The presence or absence of coughing.
Weakness	Patient weakness	Yes	The presence or absence of weakness.

Tumor Size	Size of tumor	Yes	Different patients individuals may have different sizes of tumor.
Diabetes  Mellitus	The presence or absence of diabetes mellitus.	Yes	The presence or absence of diabetes mellitus.
MI_6mo	Myocardial Infarction	Yes	within the past 6 months presence or absence of a myocardial infarction
PAD	Peripheral Arterial disease	Yes	Peripheral arterial disease presence or absence
Smoking	Smoking history	Yes	Smoking history of a patient
Asthma	Asthma history	Yes	If there is asthma disease in medical history.
Age	Age of the patient	<sub> </sub> Yes	Different patients have different ages