

Project Initialization and Planning Phase

| | |
|---------------|--|
| Date | 20 April 2025 |
| Student Name | Yadnesh Sanjay Budukh |
| Project Name | Uncovering The Hidden Treasures Of The Mushroom Kingdom: A Classification Analysis |
| Maximum Marks | 3 Marks |

Problem Statements (Uncovering The Hidden Treasures Of The Mushroom Kingdom: A Classification Analysis):

| PS No. | I am (Customer) | I'm trying to | But | Because | Which makes me feel |
|--------|---------------------------------------|--|---|---|---|
| PS- 1 | A consumer who wants to buy mushrooms | Purchase mushrooms safely | I am scared of wild mushrooms | I don't know which ones are poisonous | Unsure and unsafe about what I consume |
| PS- 2 | A shopkeeper | Sell safe, fresh mushrooms | I'm concerned about customer health | Mushrooms are perishable and hard to identify | Stressed about quality and customer trust |
| PS- 3 | A restaurant owner | Use high-quality mushrooms in dishes | I struggle to find reliable sources | Some mushrooms may be harmful | Worried about safety and my business reputation |
| PS- 4 | A biology student or forager | Learn and identify mushroom species | I find it hard to tell species apart | They look very similar | Confused, frustrated, and hesitant |
| PS- 5 | A tech researcher | Build an AI mushroom classification system | I lack a robust image dataset | Mushrooms vary by species and environment | Limited and technically challenged |
| PS- 6 | An environmentalist | Promote sustainable mushroom harvesting | It's hard to track species impact | Lack of identification tools in the wild | Worried about overharvesting and ecology |
| PS- 7 | A parent | Teach my kids about safe foraging | I'm scared they might pick poisonous ones | I can't reliably teach what's safe | Anxious and unconfident as a guide |

| | | | | | |
|---------------|----------------------------------|--|--|---|--|
| PS- 8 | A pharmaceutical researcher | Discover medicinal mushrooms | Identification is slow and manual | Misidentification risks research accuracy | Limited in drug discovery and progress |
| PS- 9 | An AI/ML student | Train a deep learning model on mushrooms | There are too many similar-looking samples | Labeling is expensive and hard | Overwhelmed and unsure of training data quality |
| PS- 10 | An NGO field worker | Educate rural communities about mushrooms | There's no easy tool for live identification | Language and tech access barriers exist | Helpless in reaching and empowering locals |
| PS- 11 | A grocery buyer for supermarkets | Source large quantities of safe mushrooms | I can't verify all sources accurately | Suppliers may mix types or store improperly | Concerned about liability and customer complaints |
| PS- 12 | A food delivery aggregator | Support mushroom-based dish partners | Restaurants may use unsafe ingredients | They lack easy ID tools | Worried about brand image and customer safety |
| PS- 13 | A forest ranger | Monitor mushroom types in protected areas | I can't classify them efficiently in the field | Many are undocumented or rare | Frustrated by lack of real-time identification |
| PS- 14 | A health-conscious individual | Track the health benefits of different mushrooms | I can't identify what's in the store or dish | There's no easy app for instant scanning | Disappointed and disconnected from my health goals |