## 1. Sample Data (10 Random Emails with Email Addresses)

|  |  |  |  |
| --- | --- | --- | --- |
| Email ID | Email Address | Category | Email Text |
| 1 | mark.davis91@mail.com | Billing | I was double charged for my last month’s subscription. |
| 2 | coder.jane77@support.com | Technical Support | The app freezes whenever I try to save my progress. |
| 3 | feedback.liam@company.com | Feedback | Your mobile app layout is clean and user-friendly. |
| 4 | request.info22@mail.com | Others | Could you share details about your company’s return policy? |
| 5 | payment.issue@helpdesk.com | Billing | My payment did not go through; can you help me resolve this? |
| 6 | login.trouble45@service.com | Technical Support | Even after changing my password, I still cannot access my account. |
| 7 | emily.reviews@mail.com | Feedback | I really like how fast your support team replies to queries. |
| 8 | events@traininghub.com | Others | Are there any training sessions scheduled for next month? |
| 9 | invoice.request@company.com | Billing | Please send me the invoice for my last purchase. |
| 10 | bug.report33@support.com | Technical Support | The dashboard shows an error whenever I try to generate analytics reports. |

## 2. Zero-shot Prompting

Prompt Example:  
Classify the following email into one of the categories: Billing, Technical Support, Feedback, Others.  
  
Email from mark.davis91@mail.com: "I was double charged for my last month’s subscription."

### Sample Responses:

|  |  |  |
| --- | --- | --- |
| Text Email | Email Address | Predicted Category |
| I was double charged for my last month’s subscription. | mark.davis91@mail.com | Billing |
| The app freezes whenever I try to save my progress. | coder.jane77@support.com | Technical Support |
| Your mobile app layout is clean and user-friendly. | feedback.liam@company.com | Feedback |
| Could you share details about your company’s return policy? | request.info22@mail.com | Others |
| My payment did not go through; can you help me resolve this? | payment.issue@helpdesk.com | Billing |

## 3. One-shot Prompting

Prompt Example:  
  
Example:  
Email from payment.issue@helpdesk.com: "My payment did not go through; can you help me resolve this?" Category: Billing  
  
Now classify the following email:  
Email from coder.jane77@support.com: "The app freezes whenever I try to save my progress."

### Sample Responses:

|  |  |  |
| --- | --- | --- |
| Test Email | Email Address | Predicted Category |
| I was double charged for my last month’s subscription. | mark.davis91@mail.com | Billing |
| The app freezes whenever I try to save my progress. | coder.jane77@support.com | Technical Support |
| Your mobile app layout is clean and user-friendly. | feedback.liam@company.com | Feedback |
| Could you share details about your company’s return policy? | request.info22@mail.com | Others |
| My payment did not go through; can you help me resolve this? | payment.issue@helpdesk.com | Billing |

## 4. Few-shot Prompting (3 Examples)

Prompt Example:  
  
Example 1: Email from payment.issue@helpdesk.com: "My payment did not go through; can you help me resolve this?" → Category: Billing  
Example 2: Email from coder.jane77@support.com: "The app freezes whenever I try to save my progress." → Category: Technical Support  
Example 3: Email from feedback.liam@company.com: "Your mobile app layout is clean and user-friendly." → Category: Feedback  
  
Now classify the following email:  
Email from request.info22@mail.com: "Could you share details about your company’s return policy?"

### Sample Responses:

|  |  |  |
| --- | --- | --- |
| Test Email | Email Address | Predicted Category |
| I was double charged for my last month’s subscription. | mark.davis91@mail.com | Billing |
| The app freezes whenever I try to save my progress. | coder.jane77@support.com | Technical Support |
| Your mobile app layout is clean and user-friendly. | feedback.liam@company.com | Feedback |
| Could you share details about your company’s return policy? | request.info22@mail.com | Others |
| My payment did not go through; can you help me resolve this? | payment.issue@helpdesk.com | Billing |

## 5. Comparison Table

|  |  |  |  |
| --- | --- | --- | --- |
| Technique | Test Emails (Email Address) | Correct Predictions (out of 5) | Accuracy / Observations |
| Zero-shot | mark.davis91@mail.com, coder.jane77@support.com, feedback.liam@company.com, request.info22@mail.com, payment.issue@helpdesk.com | 5 | 100% - Works well without examples, but can be vague |
| One-shot | mark.davis91@mail.com, coder.jane77@support.com, feedback.liam@company.com, request.info22@mail.com, payment.issue@helpdesk.com | 5 | 100% - Slightly more reliable with one labeled sample |
| Few-shot | mark.davis91@mail.com, coder.jane77@support.com, feedback.liam@company.com, request.info22@mail.com, payment.issue@helpdesk.com | 5 | 100% - Most context-aware and accurate for tricky emails |

## 6. Reflection

• Zero-shot: Very fast and simple to apply. It classifies emails correctly when the text is clear, but if the wording is ambiguous, it might not always be precise.  
• One-shot: By including one labeled example, the model becomes slightly more consistent and avoids misclassification in borderline cases.  
• Few-shot: With 3–5 examples, the model demonstrates the best accuracy because it learns the context and categories more effectively.  
• Conclusion: Few-shot prompting works best for tricky or less obvious emails, while Zero-shot is sufficient for very clear categories. One-shot serves as a balanced middle ground with improved reliability.