**INT426 (Gen AI) CA-3 Set 7**

**MCQs on Generative AI, Large Language Models, and Coding for Applications**

**Instructions: Choose the best answer for each question.**

**1. Generative AI focuses on:**

**a) Solving complex mathematical problems b) Creating new content like text, code, or images c) Optimizing existing algorithms d) Diagnosing medical conditions (b)**

**2. Large Language Models (LLMs) are trained on:**

**a) Small datasets of labeled data b) Massive amounts of text and code c) User-generated content only d) Images and videos exclusively (b)**

**3. Which neural network architecture is commonly used for LLMs?**

**a) Convolutional Neural Networks (CNNs) b) Recurrent Neural Networks (RNNs) c) Transformers d) Generative Adversarial Networks (GANs) (c)**

**4. Fine-tuning an LLM involves:**

**a) Training it from scratch on a new task b) Adapting it to perform a specific task with additional training c) Increasing the number of parameters in the model d) Removing unused parts of the model (b)**

**5. A limitation of LLMs can be:**

**a) High computational power required b) Difficulty in interpreting their reasoning c) Both a and b d) Neither a nor b (c)**

**6. GPT-3.5 is an example of:**

**a) A recommender system b) A large language model c) A chatbot development platform d) A creative coding tool (b)**

**7. Which of these is NOT a skill needed for building apps with AI?**

**a) Understanding of Generative AI concepts b) Basic coding knowledge c) Data analysis skills d) Expertise in advanced mathematics (d)**

**8. Dall-E can be used to generate:**

**a) Personalized product recommendations b) Chatbot conversation flows c) Creative text formats like poems d) Realistic images from text descriptions (d)**

**9. When building a recommender system, the goal is to:**

**a) Filter irrelevant information b) Suggest items users might be interested in c) Collect user feedback d) Optimize website loading speed (b)**

**10. Chatbots are used for:**

**a) Analyzing large datasets b) Providing customer service or information c) Creating artistic visuals d) Developing mobile applications (b)**

**11. Limited access to GPT-4 compared to GPT-3.5 might be due to:**

**a) Higher computational cost for running the model b) Concerns about potential misuse of its capabilities c) Both a and b d) Neither a nor b (c)**

**12. ChatGPT for Beginners focuses on using the model for:**

**a) Advanced natural language processing tasks b) Automating tasks in Microsoft Excel c) Building complex chatbots d) Training your own LLM (b)**

**13. When solving creative problems with AI, it's important to:**

**a) Define clear goals and evaluation metrics b) Provide diverse and relevant data for training c) Iteratively refine prompts and approaches d) All of the above (d)**

**14. Coding with AI can help in tasks like:**

**a) Generating repetitive code snippets b) Automating data cleaning and preprocessing c) Debugging complex algorithms d) All of the above (d)**

**15. The future of Generative AI and LLMs likely involves:**

**a) Increased accessibility and integration with various tools b) Development of more specialized and efficient models c) Exploration of ethical considerations and potential biases d) All of the above (d)**