

You may discuss these questions with your classmates, as it may be helpful to gain a good understanding of the topic. Nonetheless you should always submit your own work!
Use a word processor to answer these questions, attach this questions page to your answers.

Question 1.

Depict the simplified TPU architecture we discussed in class, show how the modules interact with each other. Explain the purpose of the microengine and the scheduler.

Question 2.

List the parameters that are used for control of TPU channel functions.

Question 3.

Assume the TPU is used to control a stepper motor.

- a) Depict the parameters for the primary channel in the two-port parameter RAM.
- b) Depict the parameters for the secondary channels in the two-port parameter RAM.

Question 4.

What is the main advantage of using pull-up resistors in a Bus connection?

Question 5.

What are the four main issues to take into consideration when designing high-speed circuits?