



MICROPROCESSOR TECHNOLOGY

**COLLECTION OF MULTIPLE
CHOICE QUESTIONS**

SAIFULLAH SALAM
MOHD FAIZAL ZULKIFLI
AMAR FAIZ ZAINAL ABIDIN
MOHD SYAFIQ MISPLAN
MOHD SAAD HAMID
FAKRULLAH IDRIS
KHAIRUL AMRI TOFROWAIH

MICROPROCESSOR TECHNOLOGY

COLLECTION OF MULTIPLE CHOICE QUESTIONS

**SAIFULLAH SALAM
MOHD FAIZAL ZULKIFLI
AMAR FAIZ ZAINAL ABIDIN
MOHD SYAFIQ MISPLAN
MOHD SAAD HAMID
FAKHRULLAH IDRIS
KHAIRUL AMRI TOFROWAIH**

Penerbit UTeM Press

Universiti Teknikal Malaysia Melaka

2023

© Universiti Teknikal Malaysia Melaka

FIRST PUBLISHED 2023

All rights reserved. No part of this publication may be reproduced, stored in a retrieval system, or transmitted, electronic, mechanical photocopying, recording or otherwise, without the prior permission of the Penerbit UTeM Press,
Universiti Teknikal Malaysia Melaka.

Member of the Malaysian Scholarly Publishing Council (MAPIM)
Member of the Malaysian Book Publishers Association (MABOPA)

Manuscript Editor:
Fatonah Salehuddin

Book Cover Designer and Typesetter:
Ahmad Masmulyadi Mohd Yusof

Published and Printed in Malaysia by:
Penerbit UTeM Press
Universiti Teknikal Malaysia Melaka
Hang Tuah Jaya, 76100 Durian Tunggal, Melaka, Malaysia.
Tel: +606 270 1241 Faks: +606 270 1038

PERPUSTAKAAN	
Universiti Teknikal Malaysia Melaka	
No. Akademik	No. Tempahan
87516931	QB 76.5 525 2023 01 13/01/24
26 JAN 2024	

TABLE OF CONTENTS

Preface.....	vii
CHAPTER 1: INTRODUCTION TO DIGITAL CONCEPTS	3
CHAPTER 2: BINARY ARITHMETIC AND DIGITAL CODES.....	25
CHAPTER 3: LOGIC GATES AND COMBINATIONAL LOGIC.....	43
CHAPTER 4: DATA CONTROL DEVICE.....	75
CHAPTER 5: FLIP-FLOPS AND SEQUENTIAL LOGIC CIRCUIT	87
CHAPTER 6: APPLICATION OF SEQUENTIAL LOGIC CIRCUIT	109
CHAPTER 7: MICROCOMPUTER FUNDAMENTALS	121
CHAPTER 8: INTRODUCTION TO INTEL 8085'S HARDWARE	137
CHAPTER 9: INTRODUCTION TO INTEL 8085'S INSTRUCTIONS	155
CHAPTER 10: INTRODUCTION TO INTEL 8085'S INSTRUCTION SET	167
CHAPTER 11: PROGRAMMING TECHNIQUE	203



MICROPROCESSOR TECHNOLOGY

COLLECTION OF MULTIPLE
CHOICE QUESTIONS

FACULTY OF ELECTRICAL AND
ELECTRONICS ENGINEERING TECHNOLOGY



PENERBIT
UTeM
Press

Website : <https://penerbit.utem.edu.my>

Books Online : <https://utembooks.utem.edu.my>

Email : penerbit@utem.edu.my