CONTENTS

1. Introduction		1
2. Description and activities of yeasts		
2.1	Description of yeasts	2
2.2	Structure of the yeast cell	2 2 3 5
2.3	Yeast reproduction	3
2.4	Factors affecting the growth of yeasts	5
2.5	Spoilage of foods by yeasts	7
2.6	Public health significance of yeasts in foods and beverages	8
3. Des	cription and activities of moulds	9
3.1	Activities of moulds	9
3.2	Mycotoxins	9
3.3	Structure of moulds	10
3.4	Reproduction	11
4. Ve2	asts and moulds in bakeries	13
4.1	Introduction	13
4.2	How yeasts gain access to bread	13
4.3	Spoilage of bakery products by yeasts	14
4.4	Avoiding yeast spoilage in bakeries	20
4.5	How moulds gain access to bread	22
4.6	Moulds that commonly occur on bakery products	24
4.7	Avoiding mould spoilage in bakeries	28
4.8	Methods of preventing mould problems associated with bakery	31
4.9	Methods involving prevention of contamination	36
5.	Yeasts and moulds in dairies	39
5.1	Introduction	39
5.2	Yeasts in dairy products	39
5.3	Avoiding yeast spoilage in dairies	43
5.4	Yeasts as pathogens in dairy products	44
5.5	Moulds in dairy products	45
6.	Yeasts and moulds in fruit-using factories	47
6.1	Introduction	47
6.2	Yeasts and fresh fruits	48
6.3	Yeasts and processed fruits	50
6.4	Moulds and fresh fruits	53
6.5	Moulds and processed fruits	55

7.	Other foods where yeasts and moulds are important	57
8.	Methods for detection and identification of yeasts and moulds	63
8.1	Sampling surfaces and packaging materials	64
8.2	Air sampling	64
8.3	Chemical methods	64
8.4	Electrometric techniques	65
8.5	Enzyme-linked immunosorbent assay (ELISA)	65
8.6	Fatty acid profiling	66
8.7	Electronic noses	66
8.8	Bioluminescence	66
8.9	Molecular methods	66
9.	Conclusions	69
10.	Acknowledgements	70
11.	References	71
Appe	ndix 1 – References related to General Hygiene Precautions	82