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## **APPENDICES**

## Appendix A

### Standard Calibration Curve

The concentration versus absorbance tables of DTZ HCl in deionized water at 237 nm. , HCl acid pH 1.2 at 237 nm. and in phosphate buffer pH 6.8 at 237 nm. are presented in Table 1A-3A and the standard curves of DTZ HCl in these mediums are illustrated in Figure 1A-4A, respectively

Table 1A Absorbance of DTZ HCl in D.I. water determined at 237 nm.

Concentration (mcg/ml)	Absorbance
0.000	0.000
2.002	0.115
4.004	0.230
6.006	0.338
8.008	0.454
10.010	0.556
12.012	0.666



Table 2A Absorbance of DTZ HCl in pH 1.2 hydrochloric buffer medium determined at 237 nm.

Concentration (mcg/ml)	Absorbance
0.000	0.000
2.000	0.119
4.000	0.228
6.000	0.338
8.000	0.440
10.000	0.550
12.000	0.650

Table 3A Absorbance of DTZ HCl in pH 6.8 phosphate buffer medium determined at 237 nm.

Concentration (mcg/ml)	Absorbance
0.000	0.000
2.000	0.114
4.000	0.225
6.000	0.330
8.000	0.438
10.000	0.547
12.000	0.655

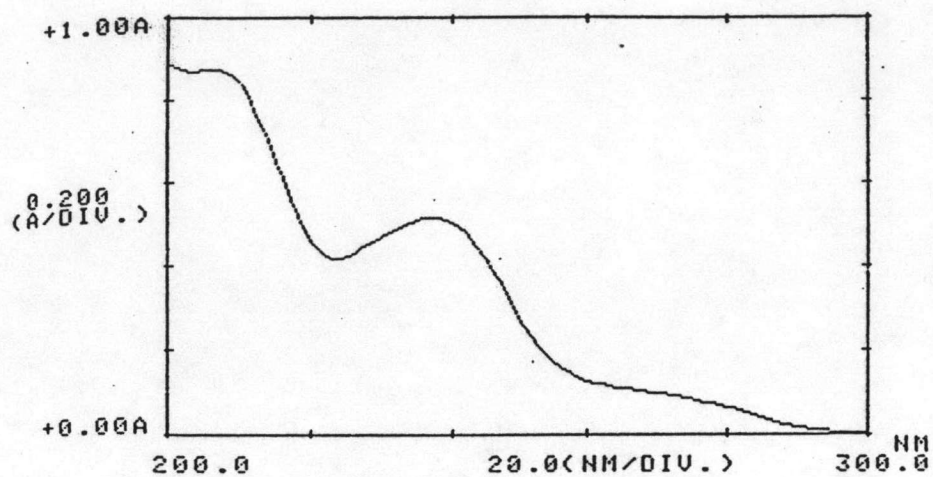


Figure 1A The UV spectrum of DTZ HCl in D.I. water

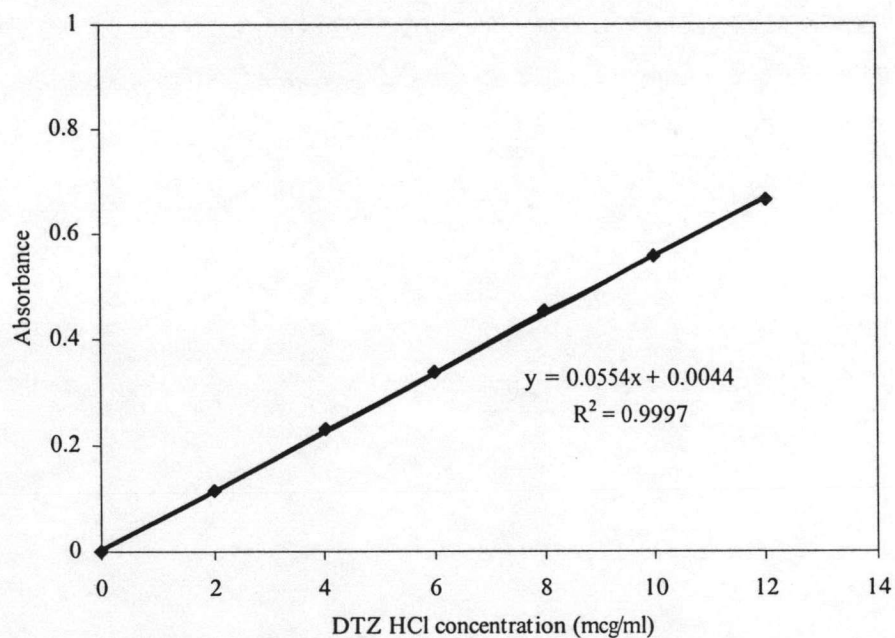


Figure 2A Calibration curve of DTZ HCl in water at 237 nm.

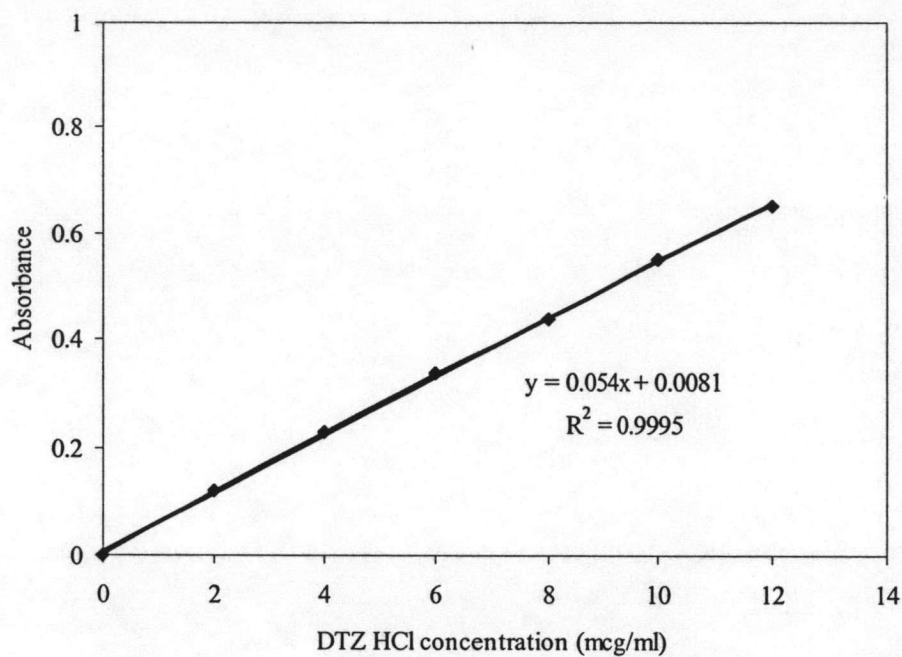


Figure 3A Calibration curve of DTZ HCl in pH 1.2 phosphate buffer medium at 237 nm.

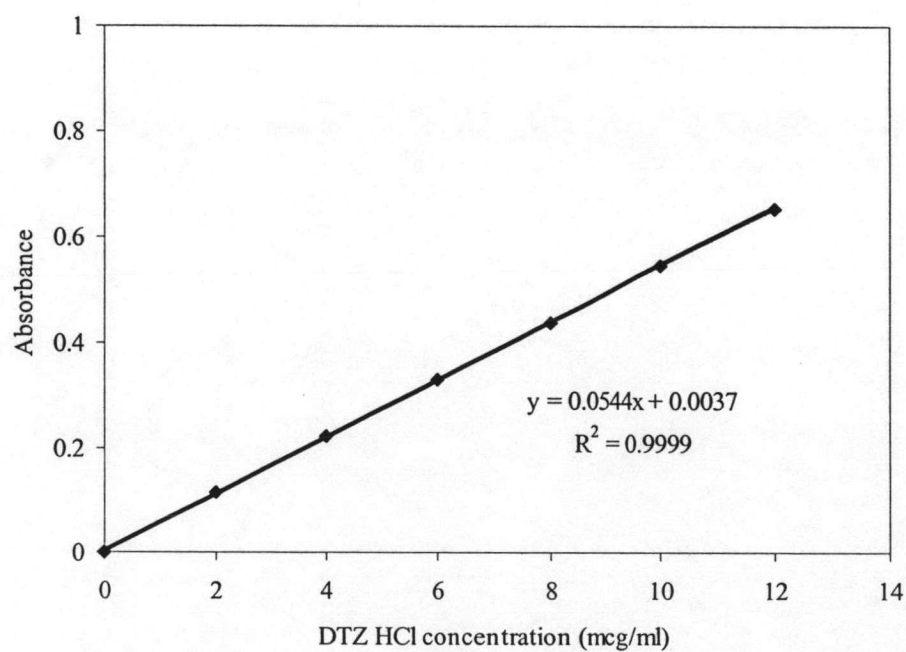


Figure 4A Calibration curve of DTZ HCl in pH 6.8 phosphate buffer medium at 237 nm.

## Appendix B

### Drug content

Table 1B Percentage of drug content in coated pellets

Formulations	% Experiment drug content			Average	± SD	%weight increase
	1	2	3			
uncoat	99.80	99.40	100.40	99.87	0.50	-
carnauba wax 10%w/w	101.22	100.55	101.65	101.14	0.55	9.37
carnauba wax 15%w/w	100.48	100.02	99.78	100.09	0.36	15.54
carnauba wax 20%w/w	99.78	99.52	99.28	99.53	0.25	21.67
GMS 10%w/w	101.00	101.22	99.90	100.71	0.71	9.85
GMS 20%w/w	100.00	100.72	101.20	100.64	0.60	19.90
GMS 30%w/w	101.24	102.27	102.55	102.02	0.69	28.14
Compritol 10%w/w	100.12	99.67	101.00	100.26	0.68	10.34
Compritol 20%w/w	98.30	99.52	100.23	99.35	0.98	21.46
Compritol 30%w/w	101.24	104.41	101.75	102.47	1.70	27.58
Compritol 40%w/w	103.36	102.81	101.95	102.71	0.71	37.07
Compritol 50%w/w	99.25	101.09	101.99	100.78	1.40	49.70
Compritol 60%w/w	102.29	100.37	103.59	102.08	1.62	57.60
EC 5%w/w	100.87	101.49	100.65	101.00	0.44	4.55
EC 7%w/w	101.92	101.27	101.27	101.49	0.38	6.03
EC 9%w/w	100.73	100.30	100.95	100.66	0.33	8.89
EC 11%w/w	100.33	99.99	101.04	100.45	0.54	11.17
Compritol:EC (1:1) 10% w/w	99.67	98.55	100.12	99.45	0.81	11.25
Compritol:EC (1:1) 15% w/w	99.31	100.72	101.17	100.40	0.97	15.19
Compritol:EC (1:1) 20% w/w	100.97	100.48	100.00	100.48	0.49	20.10
Compritol:EC (2:1) 10% w/w	99.20	98.56	100.12	99.29	0.78	11.41
Compritol:EC (2:1) 15% w/w	100.02	100.93	101.40	100.78	0.70	14.75
Compritol:EC (2:1) 20% w/w	100.72	100.72	101.47	100.97	0.43	19.52
Compritol:EC (3:1) 10% w/w	100.42	100.12	100.33	100.29	0.15	10.17
Compritol:EC (3:1) 15% w/w	102.34	101.17	100.93	101.48	0.75	13.96
Compritol:EC (3:1) 20% w/w	100.97	101.94	100.72	101.21	0.64	19.38
Compritol:EC (4:1) 10% w/w	101.22	100.78	100.55	100.85	0.34	9.69
Compritol:EC (4:1) 15% w/w	101.40	101.64	100.72	101.25	0.48	14.22
Compritol:EC (4:1) 20% w/w	100.48	100.72	99.52	100.24	0.63	20.39





Table 2C Cumulative released of DTZ HCl coated pellets F1\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	29.18	27.88	28.85	28.64	0.68	32.42	30.97	32.06	31.82	0.75
0.50	33.40	32.09	32.26	32.58	0.71	37.11	35.65	35.84	36.20	0.79
0.75	50.50	52.10	51.46	51.35	0.80	56.11	57.88	57.18	57.06	0.89
1	64.54	66.80	69.24	66.86	2.35	71.71	74.22	76.94	74.29	2.61
2	67.68	67.69	70.49	68.62	1.62	75.20	75.21	78.32	76.24	1.80
3	69.87	70.70	73.68	71.42	2.01	77.63	78.55	81.87	79.35	2.23
4	70.78	72.43	74.96	72.72	2.11	78.64	80.47	83.29	80.80	2.34
6	71.85	73.68	76.08	73.87	2.12	79.84	81.87	84.53	82.08	2.35
8	75.04	76.40	78.82	76.76	1.92	83.38	84.89	87.58	85.28	2.13
10	80.37	81.58	82.89	81.61	1.26	89.30	90.65	92.10	90.68	1.40
12	85.42	86.81	86.02	86.08	0.70	94.91	96.46	95.58	95.65	0.77

\*F1 represent for DTZ HCl pellets coated with 10%w/w of Carnauba wax

Table 3C Cumulative released of DTZ HCl coated pellets F2\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	2.92	3.08	2.76	2.92	0.16	3.24	3.42	3.06	3.24	0.18
0.50	12.32	12.65	10.39	11.79	1.22	13.69	14.06	11.54	13.10	1.36
0.75	18.30	18.47	18.44	18.40	0.09	20.33	20.52	20.49	20.45	0.10
1	22.72	22.89	22.38	22.67	0.26	25.25	25.44	24.86	25.18	0.29
2	25.57	25.42	27.33	26.11	1.06	28.41	28.24	30.37	29.01	1.18
3	27.96	26.83	28.77	27.85	0.97	31.07	29.81	31.96	30.95	1.08
4	29.72	29.07	29.24	29.34	0.34	33.03	32.30	32.49	32.60	0.38
6	31.34	33.28	31.50	32.04	1.07	34.82	36.97	35.00	35.60	1.19
8	31.83	33.96	32.97	32.92	1.06	35.37	37.73	36.64	36.58	1.18
10	32.33	35.12	35.10	34.19	1.61	35.92	39.03	39.01	37.98	1.79
12	34.45	35.81	35.80	35.35	0.78	38.28	39.79	39.77	39.28	0.87

\*F2 represent for DTZ HCl pellets coated with 15 %w/w of Carnauba wax

Table 4C Cumulative released of DTZ HCl coated pellets F3\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	1.07	0.85	1.15	1.02	0.15	1.18	0.95	1.27	1.14	0.17
0.50	4.88	3.95	3.71	4.18	0.62	5.42	4.39	4.12	4.64	0.69
0.75	7.63	6.82	5.62	6.69	1.01	8.48	7.58	6.24	7.43	1.12
1	9.58	8.98	7.66	8.74	0.98	10.65	9.97	8.51	9.71	1.09
2	14.97	16.08	14.59	15.22	0.77	16.64	17.87	16.21	16.91	0.86
3	16.11	20.64	16.05	17.60	2.63	17.90	22.94	17.84	19.56	2.93
4	22.46	23.14	20.45	22.02	1.40	24.95	25.72	22.72	24.46	1.56
6	26.60	28.11	28.15	27.62	0.88	29.56	31.23	31.27	30.69	0.98
8	29.81	29.55	29.59	29.65	0.14	33.12	32.83	32.87	32.94	0.16
10	33.05	30.19	30.72	31.32	1.53	36.73	33.54	34.13	34.80	1.70
12	33.73	31.48	32.18	32.46	1.15	37.48	34.98	35.75	36.07	1.28

\*F3 represent for DTZ HCl pellets coated with 20%w/w of Carnauba wax

Table 5C Cumulative released of DTZ HCl coated pellets F4\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	86.20	88.31	86.36	86.96	1.18	95.78	98.12	95.96	96.62	1.31
0.50	87.97	89.29	87.97	88.41	0.76	97.74	99.21	97.74	98.23	0.85
0.75	89.26	90.76	90.56	90.19	0.81	99.18	100.84	100.22	100.22	0.91
1	91.53	91.58	91.55	91.55	0.03	101.70	101.76	101.73	101.73	0.03
2	92.19	92.24	92.69	92.38	0.28	102.43	102.49	102.64	102.64	0.31
3	93.17	93.23	93.19	93.20	0.03	103.52	103.58	103.55	103.55	0.03
4	93.99	94.04	94.17	94.07	0.09	104.43	104.49	104.52	104.52	0.11
6	-	-	-	-	-	-	-	-	-	-
8	-	-	-	-	-	-	-	-	-	-
10	-	-	-	-	-	-	-	-	-	-
12	-	-	-	-	-	-	-	-	-	-

\*F4 represent for DTZ HCl pellets coated with 10%w/w of GMS

Table 6C Cumulative released of DTZ HCl coated pellets F5\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	87.01	86.69	86.69	86.79	0.19	96.68	96.32	96.32	96.44	0.21
0.50	87.98	87.97	88.30	88.08	0.19	97.75	97.75	98.11	97.87	0.21
0.75	89.27	90.24	90.41	89.97	0.61	99.19	100.27	100.45	99.97	0.68
1	90.89	91.55	91.55	91.33	0.38	100.99	101.72	101.72	101.48	0.42
2	92.52	92.53	92.70	92.58	0.10	102.80	102.81	103.00	102.87	0.11
3	93.18	93.19	93.20	93.19	0.01	103.53	103.55	103.55	103.54	0.01
4	94.00	94.01	94.18	94.06	0.10	104.44	104.46	104.51	104.51	0.11
6	-	-	-	-	-	-	-	-	-	-
8	-	-	-	-	-	-	-	-	-	-
10	-	-	-	-	-	-	-	-	-	-
12	-	-	-	-	-	-	-	-	-	-

\*F5 represent for DTZ HCl pellets coated with 20%w/w of GMS

Table 7C Cumulative released of DTZ HCl coated pellets F6\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	85.71	86.20	86.20	86.04	0.28	95.23	95.78	95.78	95.60	0.33
0.50	87.64	86.99	87.81	87.48	0.43	97.38	96.66	97.56	97.20	0.49
0.75	88.93	88.76	88.93	88.87	0.10	98.81	98.62	98.82	98.75	0.11
1	91.19	91.35	90.71	91.09	0.33	101.33	101.50	100.79	101.21	0.37
2	92.17	92.66	92.66	92.50	0.28	102.42	102.96	102.96	102.78	0.30
3	92.99	93.16	93.16	93.10	0.10	103.33	103.51	103.51	103.45	0.10
4	93.97	93.98	94.14	94.03	0.10	104.41	104.42	104.60	104.48	0.10
6	-	-	-	-	-	-	-	-	-	-
8	-	-	-	-	-	-	-	-	-	-
10	-	-	-	-	-	-	-	-	-	-
12	-	-	-	-	-	-	-	-	-	-

\*F6 represent for DTZ HCl pellets coated with 30%w/w of GMS



Table 8C Cumulative released of DTZ HCl coated pellets F7\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	80.93	84.23	84.75	83.31	2.07	89.92	93.59	94.17	92.56	2.30
0.50	89.30	89.34	89.69	89.44	0.22	99.22	99.26	99.66	99.38	0.24
0.75	92.19	92.06	92.94	92.40	0.47	102.44	102.29	103.26	102.66	0.53
1	93.02	93.06	93.08	93.05	0.03	103.36	103.40	103.42	103.39	0.03
2	91.94	91.80	93.91	92.55	1.18	102.16	102.00	104.34	102.83	1.31
3	92.57	92.43	92.47	92.50	0.07	102.86	102.70	102.75	102.77	0.08
4	92.50	93.40	93.45	93.12	0.53	102.78	103.78	103.83	103.46	0.59
6	-	-	-	-	-	-	-	-	-	-
8	-	-	-	-	-	-	-	-	-	-
10	-	-	-	-	-	-	-	-	-	-
12	-	-	-	-	-	-	-	-	-	-

\*F7 represent for DTZ HCl pellets coated with 10%w/w of Compritol 888 ATO®

Table 9C Cumulative released of DTZ HCl coated pellets F8\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	85.97	84.41	86.49	85.62	1.09	95.52	93.78	96.10	95.14	1.21
0.50	87.62	87.60	88.32	87.85	0.41	97.35	97.34	98.13	97.61	0.46
0.75	89.45	89.61	89.12	89.39	0.25	99.39	99.56	99.02	99.32	0.28
1	90.60	90.76	91.30	90.88	0.37	100.66	100.84	101.45	100.98	0.41
2	91.75	91.73	91.42	91.63	0.19	101.94	101.92	101.57	101.81	0.21
3	92.37	92.36	92.56	92.43	0.11	102.64	102.62	102.85	102.70	0.12
4	93.00	93.33	93.36	93.23	0.20	103.33	103.70	103.74	103.59	0.22
6	-	-	-	-	-	-	-	-	-	-
8	-	-	-	-	-	-	-	-	-	-
10	-	-	-	-	-	-	-	-	-	-
12	-	-	-	-	-	-	-	-	-	-

\*F8 represent for DTZ HCl pellets coated with 20%w/w of Compritol 888 ATO®

Table 10C Cumulative released of DTZ HCl coated pellets F9\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	9.88	9.47	9.48	9.61	0.24	10.98	10.52	10.54	10.68	0.26
0.50	19.01	19.18	19.53	19.24	0.26	21.13	21.31	21.70	21.38	0.29
0.75	42.33	41.63	42.51	42.16	0.46	47.03	46.26	47.23	46.84	0.51
1	49.57	49.74	47.84	49.05	1.05	55.08	55.26	53.16	54.50	1.17
2	52.03	53.58	52.19	52.60	0.86	57.81	59.54	57.98	58.44	0.95
3	54.50	55.73	56.51	55.43	0.82	60.56	61.92	62.28	61.59	0.91
4	56.82	56.67	58.39	57.30	0.95	63.14	62.97	64.88	63.66	1.06
6	63.68	63.01	62.83	63.18	0.45	70.76	70.01	69.82	70.19	0.50
8	68.87	70.80	68.54	69.40	1.22	76.53	78.66	76.15	77.11	1.36
10	72.72	72.93	71.69	72.45	0.67	80.80	81.04	79.65	80.50	0.74
12	75.22	73.87	73.48	74.19	0.91	83.58	82.07	81.64	82.43	1.02

\*F9 represent for DTZ HCl pellets coated with 30%w/w of Compritol 888 ATO®

Table 11C Cumulative released of DTZ HCl coated pellets F10\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	6.30	6.49	6.01	6.27	0.25	7.00	7.22	6.68	6.97	0.27
0.50	16.89	18.11	16.02	17.00	1.05	18.77	20.12	17.80	18.89	1.17
0.75	26.63	28.38	23.84	26.28	2.30	29.59	31.54	26.49	29.21	2.55
1	34.05	34.60	31.57	33.41	1.61	37.83	38.45	35.08	37.12	1.79
2	38.76	40.19	36.26	38.41	1.99	43.07	44.66	40.29	42.67	2.21
3	44.92	46.89	44.30	45.37	1.35	49.91	52.09	49.22	50.41	1.50
4	49.05	49.48	49.12	49.22	0.23	54.50	54.97	54.58	54.68	0.25
6	52.01	55.56	55.21	54.26	1.96	57.79	61.74	61.34	60.29	2.18
8	58.12	60.15	59.79	59.35	1.08	64.58	66.83	66.44	65.95	1.20
10	61.17	62.70	62.51	62.12	0.84	67.96	69.66	69.46	69.03	0.93
12	64.06	66.13	65.25	65.15	1.04	71.18	73.48	72.50	72.39	1.15

\*F10 represent for DTZ HCl pellets coated with 40%w/w of Compritol 888 ATO®

Table 12C Cumulative released of DTZ HCl coated pellets F11\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	4.55	4.58	4.50	4.54	0.04	5.05	5.09	5.00	5.05	0.05
0.50	7.36	7.40	7.34	7.37	0.03	8.18	8.22	8.16	8.19	0.03
0.75	13.82	14.69	12.78	13.76	0.96	15.36	16.32	14.20	15.29	1.06
1	21.27	21.80	21.09	21.39	0.37	23.64	24.23	23.43	23.76	0.41
2	25.15	25.87	25.31	25.44	0.37	27.95	28.74	28.13	28.27	0.41
3	29.08	30.14	29.59	29.60	0.53	32.31	33.49	32.87	32.89	0.59
4	35.30	37.07	36.33	36.23	0.89	39.22	41.19	40.37	40.26	0.99
6	37.42	38.86	37.77	38.01	0.75	41.57	43.18	41.96	42.24	0.84
8	43.55	44.49	44.08	44.04	0.47	48.39	49.43	48.98	48.93	0.52
10	48.01	48.61	48.89	48.50	0.45	53.34	54.01	54.32	53.89	0.50
12	50.08	50.51	50.62	50.40	0.29	55.64	56.12	56.25	56.01	0.32

\*F11 represent for DTZ HCl pellets coated with 50%w/w of Compritol 888 ATO®

Table 13C Cumulative released of DTZ HCl coated pellets F12\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.50	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.75	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
2	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
3	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
4	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
6	1.89	1.86	1.98	1.91	0.06	2.10	2.06	2.20	2.12	0.07
8	1.95	2.01	2.07	2.01	0.06	2.16	2.24	2.30	2.23	0.07
10	3.37	2.92	2.88	3.06	0.27	3.75	3.25	3.20	3.40	0.31
12	4.02	3.72	3.76	3.83	0.16	4.46	4.13	4.18	4.26	0.18

\* F12 represent for DTZ HCl pellets coated with 60%w/w of Compritol 888 ATO®



Table 14C Cumulative released of DTZ HCl coated pellets F13\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	1.88	1.98	2.15	2.00	0.14	2.09	2.19	2.39	2.23	0.16
0.50	4.30	4.29	4.23	4.27	0.04	4.78	4.76	4.69	4.75	0.05
0.75	7.73	7.78	7.70	7.74	0.04	8.59	8.64	8.55	8.60	0.04
1	12.57	12.50	12.43	12.50	0.07	13.97	13.88	13.81	13.89	0.08
2	29.79	29.31	28.82	29.31	0.49	33.10	32.56	32.02	32.56	0.54
3	45.07	44.90	44.57	44.85	0.25	50.07	49.89	49.52	49.83	0.28
4	56.61	56.11	57.24	56.65	0.57	62.90	62.35	63.60	62.95	0.63
6	68.27	68.42	71.19	69.29	1.64	75.86	76.02	79.10	76.99	1.82
8	76.48	76.47	79.59	77.52	1.80	84.98	84.97	88.44	86.13	2.00
10	82.50	82.82	83.86	83.06	0.71	91.67	92.02	93.18	92.29	0.79
12	86.47	85.00	86.71	86.06	0.92	96.08	94.45	96.34	95.62	1.03

\*F13 represent for DTZ HCl pellets coated with 5%w/w of EC

Table 15C Cumulative released of DTZ HCl coated pellets F14\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	1.29	1.42	1.65	1.46	0.18	1.44	1.58	1.83	1.62	0.20
0.50	2.90	2.90	3.20	3.00	0.17	3.22	3.22	3.55	3.33	0.19
0.75	5.43	5.73	5.81	5.66	0.20	6.04	6.36	6.46	6.29	0.22
1	9.21	9.14	9.29	9.21	0.07	10.24	10.15	10.32	10.24	0.08
2	19.64	22.08	23.87	21.86	2.13	21.82	24.53	26.53	24.29	2.36
3	35.94	35.80	37.13	36.29	0.73	39.93	39.78	41.26	40.32	0.81
4	47.86	48.87	49.56	48.76	0.85	53.18	54.30	55.07	54.18	0.95
6	62.20	61.42	62.61	62.08	0.60	69.11	68.25	69.57	68.97	0.67
8	69.21	68.59	69.95	69.25	0.68	76.90	76.21	77.72	79.94	0.76
10	73.04	74.36	75.74	74.38	1.35	81.16	82.63	84.16	82.65	1.50
12	77.07	78.73	78.50	78.10	0.90	85.63	87.48	87.22	86.78	1.00

\*F14 represent for DTZ HCl pellets coated with 7%w/w of EC



Table 16C Cumulative released of DTZ HCl coated pellets F15\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	1.18	1.18	1.37	1.24	0.11	1.31	1.31	1.53	1.38	0.13
0.50	1.70	1.57	1.70	1.65	0.08	1.88	1.74	1.89	1.84	0.08
0.75	2.59	2.69	2.87	2.72	0.14	2.88	2.99	3.19	3.02	0.16
1	4.26	4.52	4.59	4.46	0.17	4.73	5.02	5.10	4.95	0.19
2	12.71	12.07	12.88	12.55	0.43	14.13	13.41	14.32	13.95	0.48
3	22.44	22.92	23.26	22.87	0.41	24.93	25.47	25.85	25.42	0.46
4	32.11	33.57	35.54	33.74	1.72	35.67	37.30	39.49	37.49	1.91
6	48.54	47.91	48.92	48.46	0.51	53.94	53.23	54.36	53.84	0.57
8	59.47	56.39	56.93	57.60	1.64	66.07	62.66	63.26	64.00	1.83
10	66.12	63.50	66.16	65.26	1.52	73.47	70.56	73.51	72.51	1.69
12	69.11	69.22	68.82	69.05	0.21	76.79	76.91	76.47	76.72	0.87

\*F15 represent for DTZ HCl pellets coated with 9%w/w of EC

Table 17C Cumulative released of DTZ HCl coated pellets F16\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	1.13	0.76	1.03	0.97	0.19	1.26	0.84	1.15	1.08	0.22
0.50	1.03	0.83	1.34	1.07	0.26	1.14	0.92	1.49	1.18	0.28
0.75	1.67	1.42	1.63	1.58	0.13	1.86	1.58	1.81	1.75	0.15
1	2.47	2.40	2.44	2.44	0.04	2.75	2.67	2.71	2.71	0.04
2	7.34	7.87	7.46	7.55	0.28	8.16	8.74	8.28	8.39	0.31
3	16.66	16.65	16.33	16.55	0.18	18.51	18.50	18.15	18.39	0.21
4	24.15	24.63	27.38	25.39	1.74	26.83	27.37	30.42	28.21	1.94
6	36.44	38.06	37.02	37.17	0.82	40.48	42.29	41.13	41.30	0.92
8	46.42	47.58	49.18	47.72	1.39	51.58	52.86	54.64	53.03	1.54
10	56.18	56.70	57.44	56.78	0.63	62.43	63.00	63.82	63.08	0.70
12	62.15	62.35	63.21	62.57	0.56	69.06	69.28	70.24	69.52	0.63

\*F16 represent for DTZ HCl pellets coated with 11%w/w of EC

Table 18C Cumulative released of DTZ HCl coated pellets C1\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	0.45	0.38	0.40	0.41	0.03	0.50	0.43	0.44	0.46	0.04
0.50	0.79	0.66	0.81	0.76	0.08	0.88	0.74	0.90	0.84	0.09
0.75	1.83	1.43	1.73	1.66	0.20	2.03	1.59	1.92	1.85	0.23
1	3.33	3.30	3.19	3.27	0.07	3.69	3.67	3.55	3.64	0.08
2	11.66	14.58	11.34	12.53	1.79	12.96	16.20	12.59	13.92	1.99
3	21.90	20.47	20.60	20.99	0.79	24.34	22.74	22.89	23.32	0.88
4	31.40	30.44	29.11	30.32	1.15	34.89	33.82	32.34	33.69	1.28
6	45.72	44.74	44.21	44.89	0.76	50.80	49.72	49.12	49.88	0.85
8	55.97	54.65	55.10	55.24	0.67	62.18	60.73	61.21	61.37	0.74
10	60.96	59.63	61.38	60.66	0.91	67.73	66.26	68.20	67.40	1.01
12	65.03	64.99	66.10	65.37	0.63	72.25	72.21	73.44	72.63	0.70

\*C1 represent for DTZ HCl pellets coated with 10%w/w of Compritol 888 ATO® : EC (1:1)

Table 19C Cumulative released of DTZ HCl coated pellets C2\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	0.51	0.29	0.30	0.37	0.13	0.57	0.32	0.34	0.41	0.14
0.50	0.68	0.40	0.61	0.57	0.15	0.76	0.45	0.68	0.63	0.16
0.75	0.79	0.70	0.99	0.83	0.15	0.87	0.78	1.11	0.92	0.17
1	1.15	1.18	1.56	1.30	0.23	1.28	1.31	1.73	1.44	0.25
2	4.27	4.00	4.78	4.35	0.39	4.74	4.45	5.31	4.83	0.44
3	9.17	8.58	8.60	8.78	0.34	10.19	9.53	9.55	9.76	0.38
4	13.11	13.91	13.93	13.65	0.47	14.57	15.46	15.48	15.17	0.52
6	22.03	23.16	18.79	21.33	2.27	24.48	25.73	20.88	23.70	2.52
8	28.77	31.31	31.51	30.50	1.50	31.97	34.68	35.01	33.88	1.67
10	37.37	39.03	36.72	37.71	1.19	41.52	43.36	40.81	41.90	1.32
12	45.08	45.14	44.27	44.83	0.48	50.09	50.15	49.19	49.81	0.54

\*C2 represent for DTZ HCl pellets coated with 15%w/w of Compritol 888 ATO® : EC (1:1)

Table 20C Cumulative released of DTZ HCl coated pellets C3\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.50	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.75	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
2	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
3	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
4	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
6	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
8	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
10	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
12	1.93	1.82	1.94	1.90	0.07	2.15	2.02	2.15	2.11	0.07

\*C3 represent for DTZ HCl pellets coated with 20%w/w of Compritol 888 ATO® : EC (1:1)

Table 21C Cumulative released of DTZ HCl coated pellets C4\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	3.52	3.73	3.57	3.61	0.11	3.91	4.14	3.96	4.01	0.12
0.50	5.26	5.72	5.07	5.35	0.33	5.85	6.36	5.63	5.95	0.37
0.75	8.41	8.51	8.15	8.36	0.19	9.34	9.46	9.05	9.28	0.21
1	15.72	17.19	15.39	16.10	0.96	17.47	19.10	17.10	17.89	1.06
2	36.36	37.36	35.54	36.42	0.91	40.40	41.51	39.49	40.47	1.01
3	56.58	57.92	57.86	57.45	0.76	62.87	64.35	64.29	63.84	0.84
4	72.31	72.52	73.93	72.92	0.88	80.34	80.58	82.15	81.02	0.98
6	82.68	82.41	82.54	82.54	0.14	91.87	91.57	91.71	91.71	0.15
8	85.53	84.60	85.38	85.17	0.50	95.03	94.00	94.86	94.63	0.55
10	86.93	86.81	87.75	87.16	0.52	96.59	96.45	97.51	96.85	0.57
12	88.99	89.51	89.17	89.22	0.27	98.88	99.46	99.08	99.14	0.29

\*C4 represent for DTZ HCl pellets coated with 10%w/w of Compritol 888 ATO® : EC (2:1)



Table 22C Cumulative released of DTZ HCl coated pellets C5\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	0.27	0.12	0.45	0.28	0.13	0.30	0.14	0.50	0.31	0.18
0.50	1.47	1.36	1.56	1.46	0.08	1.64	1.51	1.73	1.63	0.11
0.75	2.42	2.28	2.63	2.44	0.14	2.69	2.54	2.92	2.72	0.19
1	5.30	5.14	5.41	5.28	0.11	5.89	5.71	6.01	5.87	0.15
2	9.28	9.43	9.43	9.38	0.07	10.31	10.48	10.48	10.42	0.10
3	16.06	18.01	17.21	17.09	0.80	17.85	20.01	19.12	18.99	1.09
4	21.11	24.54	22.92	22.86	1.40	23.46	27.27	25.47	25.40	1.91
6	34.50	36.67	37.95	36.37	1.42	38.33	40.74	42.17	40.42	1.94
8	41.86	43.40	43.57	42.94	0.77	46.51	48.23	48.41	47.72	1.04
10	51.09	52.00	54.76	52.62	1.56	56.77	57.77	60.84	58.46	2.12
12	55.70	57.43	59.90	57.68	1.72	61.89	63.81	66.56	64.09	2.34

\*C5 represent for DTZ HCl pellets coated with 15%w/w of Compritol 888 ATO® : EC (2:1)

Table 23C Cumulative released of DTZ HCl coated pellets C6\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	0.27	0.16	0.09	0.15	0.13	0.30	0.17	0.01	0.16	0.14
0.50	0.53	0.17	0.14	0.28	0.22	0.59	0.19	0.16	0.31	0.24
0.75	0.91	0.48	0.68	0.69	0.21	1.01	0.54	0.75	0.77	0.24
1	1.38	0.90	1.29	1.19	0.26	1.53	1.00	1.43	1.32	0.28
2	3.70	3.38	4.76	3.94	0.72	4.11	3.75	5.29	4.38	0.81
3	7.44	7.26	7.70	7.47	0.22	8.27	8.07	8.56	8.30	0.25
4	8.86	13.39	12.77	11.67	2.45	9.85	14.88	14.19	12.97	2.73
6	17.73	17.28	18.27	17.76	0.50	19.70	19.20	20.30	19.73	0.55
8	20.69	19.90	21.39	20.66	0.75	22.99	22.11	23.77	22.96	0.83
10	21.24	21.58	22.76	21.86	0.80	23.60	23.98	25.29	24.29	0.89
12	22.28	21.97	24.31	22.85	1.27	24.76	24.42	27.01	25.39	1.41

\*C6 represent for DTZ HCl pellets coated with 20%w/w of Compritol 888 ATO® : EC (2:1)



Table 24C Cumulative released of DTZ HCl coated pellets C7\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	4.87	6.49	5.00	5.45	0.09	5.41	7.21	5.55	6.06	1.00
0.50	19.32	18.69	18.67	18.89	0.37	21.47	20.77	20.75	20.99	0.41
0.75	38.06	38.07	37.56	37.89	0.29	42.28	42.30	41.74	42.10	0.32
1	52.93	53.27	53.25	53.15	0.19	58.82	59.19	59.16	59.06	0.21
2	78.04	74.81	77.55	76.80	1.74	86.72	83.12	86.17	85.33	1.94
3	81.98	80.83	82.78	81.86	0.98	91.09	89.81	91.98	90.96	1.09
4	93.85	85.44	84.65	84.65	0.80	93.16	94.93	94.06	94.05	0.88
6	86.69	86.19	86.37	86.42	0.25	96.33	95.77	95.97	96.02	0.28
8	88.91	86.94	87.29	87.72	1.05	98.79	96.60	96.99	97.46	1.17
10	89.85	87.86	88.37	88.69	1.03	99.83	97.62	98.19	98.55	1.15
12	90.94	88.93	89.29	89.72	1.07	101.05	98.81	99.21	99.69	1.19

\*C7 represent for DTZ HCl pellets coated with 10%w/w of Compritol 888 ATO® : EC (3:1)

Table 25C Cumulative released of DTZ HCl coated pellets C8\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	0.61	0.69	0.50	0.60	0.10	0.68	0.77	0.55	0.67	0.11
0.50	1.77	1.79	1.72	1.76	0.03	1.97	1.99	1.91	1.96	0.04
0.75	4.76	4.73	4.73	4.74	0.02	5.29	5.26	5.25	5.27	0.02
1	9.25	9.30	9.01	9.19	0.16	10.28	10.33	10.01	10.21	0.18
2	30.98	33.26	35.36	33.20	2.19	34.42	39.95	39.29	36.89	2.43
3	44.00	43.05	43.88	43.64	0.52	48.88	47.83	48.75	48.49	0.57
4	51.30	50.83	52.16	51.43	0.67	57.00	56.48	57.95	57.14	0.75
6	59.01	58.37	60.68	59.35	1.20	65.57	64.86	67.43	65.95	1.33
8	66.80	66.64	67.68	67.04	0.56	74.22	74.04	75.20	74.48	0.62
10	72.06	72.39	72.63	72.36	0.28	80.07	80.43	80.70	80.40	0.32
12	74.13	74.62	74.38	74.38	0.25	82.37	82.91	82.64	82.64	0.27

\*C8 represent for DTZ HCl pellets coated with 15%w/w of Compritol 888 ATO® : EC (3:1)

Table 26C Cumulative released of DTZ HCl coated pellets C9\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	0.33	0.97	1.00	0.77	0.31	0.37	1.08	1.11	0.85	0.42
0.50	0.92	1.97	1.76	1.55	0.45	1.03	2.19	1.95	1.72	0.62
0.75	2.67	3.47	3.74	3.29	0.45	2.97	3.86	4.16	3.66	0.62
1	4.88	4.66	4.71	4.75	0.09	5.42	5.18	5.24	5.28	0.13
2	7.45	8.64	8.68	8.26	0.57	8.28	9.60	9.64	9.17	0.78
3	14.41	13.64	13.64	13.90	0.36	16.01	15.15	15.15	15.44	0.50
4	17.82	19.31	18.98	18.70	0.64	19.80	21.45	21.09	20.78	0.87
6	25.16	25.85	25.53	25.51	0.28	27.95	28.73	28.36	28.35	0.39
8	30.63	32.31	31.00	31.31	0.72	34.04	35.90	34.45	34.79	0.98
10	36.16	36.39	37.35	36.63	0.52	40.18	40.44	41.50	40.71	0.70
12	41.42	41.33	42.46	41.74	0.51	46.03	45.93	47.18	46.38	0.70

\*C9 represent for DTZ HCl pellets coated with 20%w/w of Compritol 888 ATO® : EC (3:1)

Table 27C Cumulative released of DTZ HCl coated pellets C10\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	64.27	65.24	65.89	65.13	0.82	71.41	72.49	73.21	72.37	0.91
0.50	78.79	77.66	79.46	78.64	0.91	87.54	86.29	88.29	87.37	1.01
0.75	81.77	81.44	81.96	81.72	0.26	90.85	90.49	91.06	90.80	0.29
1	82.99	82.98	83.99	83.32	0.58	92.21	92.20	93.32	92.57	0.64
2	85.67	84.04	85.70	85.14	0.95	95.19	93.37	95.23	94.60	1.06
3	86.42	85.75	86.94	86.37	0.60	96.02	95.27	96.60	95.97	0.67
4	87.49	87.63	87.86	87.66	0.19	97.22	97.36	97.62	97.40	0.21
6	88.25	88.54	88.94	88.58	0.35	98.05	98.38	98.83	98.42	0.39
8	89.32	89.78	89.21	89.44	0.30	99.25	99.76	99.13	99.38	0.34
10	90.40	90.87	90.29	90.52	0.31	100.44	100.96	100.32	100.57	0.34
12	91.31	91.95	91.20	91.49	0.40	101.46	102.17	101.34	101.65	0.45

\*C10 represent for DTZ HCl pellets coated with 10%w/w of Compritol 888 ATO® : EC (4:1)

Table 28C Cumulative released of DTZ HCl coated pellets C11\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	7.97	8.07	7.73	7.92	0.14	8.86	8.96	8.58	8.80	0.20
0.50	33.98	31.87	31.05	32.30	1.23	37.75	35.41	34.50	35.89	1.68
0.75	50.44	48.79	51.86	50.36	1.25	56.04	54.21	57.63	55.96	1.71
1	60.09	58.75	58.45	59.10	0.71	66.77	65.28	64.94	65.66	0.97
2	72.44	72.06	71.59	72.03	0.35	80.49	80.07	79.55	80.04	0.47
3	77.78	77.23	79.52	78.18	0.98	86.42	85.81	88.35	86.86	1.33
4	81.38	79.20	81.35	80.64	1.02	90.42	88.00	90.39	89.60	1.39
6	84.35	82.64	84.65	83.88	0.89	93.73	91.83	94.06	93.20	1.21
8	85.57	85.14	86.04	85.58	0.37	95.08	94.60	95.60	95.09	0.50
10	87.44	87.33	87.91	87.56	0.25	97.16	97.03	97.68	97.29	0.34
12	88.83	88.40	89.15	88.79	0.31	98.70	98.22	99.05	98.66	0.42

\*C11 represent for DTZ HCl pellets coated with 15%w/w of Compritol 888 ATO® : EC (4:1)

Table 29C Cumulative released of DTZ HCl coated pellets C12\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	1.67	1.65	1.81	1.71	0.09	1.85	1.83	2.01	1.90	0.10
0.50	4.85	4.93	5.00	4.93	0.07	5.39	5.48	5.56	5.48	0.08
0.75	8.06	7.64	8.29	7.99	0.33	8.95	8.49	9.21	8.88	0.37
1	10.99	10.95	10.39	10.78	0.33	12.21	12.17	11.55	11.98	0.37
2	23.77	21.66	22.31	22.58	1.08	26.41	24.06	24.79	25.09	1.20
3	28.42	26.77	27.75	27.65	0.83	31.58	29.74	30.84	30.72	0.92
4	32.95	32.26	32.44	32.55	0.36	36.61	35.84	36.05	36.17	0.40
6	40.62	40.40	35.88	38.97	2.68	45.13	44.89	39.87	43.30	2.97
8	43.98	42.79	42.44	43.07	0.81	48.87	47.54	47.15	47.86	0.90
10	47.21	59.63	46.63	47.38	0.84	52.46	53.65	51.81	52.64	0.93
12	50.64	50.42	49.72	50.26	0.48	56.27	56.02	55.25	55.85	0.53

\*C12 represent for DTZ HCl pellets coated with 20%w/w of Compritol 888 ATO® : EC (4:1)



### In physical stress study

Table 30C Cumulative released of DTZ HCl coated pellets C1\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	0.43	0.53	0.30	0.42	0.12	0.48	0.59	0.33	0.47	0.13
0.50	0.55	0.75	0.55	0.62	0.12	0.61	0.84	0.61	0.69	0.13
0.75	1.46	1.26	1.42	1.38	0.10	1.62	1.40	1.58	1.54	0.12
1	3.14	2.93	3.21	3.09	0.15	3.49	3.25	3.56	3.44	0.16
2	10.78	10.73	10.86	10.79	0.07	11.97	11.92	12.07	11.99	0.07
3	20.00	19.83	19.00	19.61	0.54	22.22	22.03	21.11	21.79	0.59
4	29.38	30.38	28.54	29.43	0.92	32.65	33.76	31.71	32.71	1.02
6	40.87	41.55	41.85	41.42	0.50	45.41	46.16	46.50	46.03	0.56
8	50.65	54.83	51.64	52.38	2.19	56.28	60.93	57.38	58.20	2.43
10	63.04	63.60	63.70	63.45	0.36	70.04	70.66	70.78	70.49	0.40
12	66.22	67.62	66.73	66.85	0.71	73.57	75.13	74.14	74.28	0.79

\*C1 represent for DTZ HCl pellets coated with 10%w/w of Compritol 888 ATO® : EC (1:1)

### In pH change study

Table 31C Cumulative released of DTZ HCl coated pellets C1\*

Time (hours)	Amount release (mg)			AV	±SD	%Release			AV	±SD
	1	2	3			1	2	3		
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.25	0.50	0.53	0.33	0.45	0.11	0.55	0.59	0.37	0.50	0.12
0.50	0.90	0.79	0.57	0.75	0.17	1.00	0.88	0.63	0.84	0.19
0.75	1.48	1.43	1.12	1.35	0.19	1.65	1.59	1.25	1.49	0.21
1.5	2.66	2.58	2.32	2.52	0.18	2.96	2.87	2.58	2.80	0.20
1	5.79	5.62	5.58	5.67	0.11	6.44	6.25	6.20	6.29	0.13
2	8.94	8.77	10.58	9.43	1.00	9.94	9.75	11.76	10.48	1.11
3	20.95	19.79	24.60	21.78	2.51	23.28	21.99	27.33	24.20	2.79
4	38.06	34.07	38.60	36.91	2.47	42.29	37.85	42.89	41.01	2.75
6	58.16	58.27	61.36	59.26	1.81	64.63	64.74	68.17	65.85	2.02
8	70.22	67.34	70.13	69.23	1.64	78.02	74.82	77.93	76.92	1.82
10	74.07	73.48	73.98	73.84	0.32	82.30	81.64	82.20	82.05	0.36
12	77.51	76.58	75.27	76.45	1.13	86.12	85.09	83.63	84.94	1.25

\*C1 represent for DTZ HCl pellets coated with 10%w/w of Compritol 888 ATO® : EC (1:1)



## Appendix D

### Diameter (micron), n = 300

Table 1D Diameter of uncoated DTZ HCl pellets

1048	1048	1019	1009	1000	1048	879	1001	928	1025
1048	1011	1019	1000	1002	1048	879	1009	1048	1020
1048	1026	1019	1005	1026	1054	980	1090	1019	1005
1034	1029	1000	1005	1026	1005	1034	1090	928	1034
1048	1019	1005	1079	1090	1009	1021	1100	1034	1009
1009	1009	1006	1006	1034	1001	1021	1090	1048	1034
1034	1048	1034	1006	1019	862	1034	1048	879	1049
1036	1034	1048	1048	1005	1048	1006	1034	980	1045
1033	1034	1000	1049	1034	1005	1009	1060	1005	1034
1048	1009	1034	1034	1000	1005	1019	980	980	1034
1019	1023	1079	1020	1000	1034	1019	879	1000	1034
1045	1019	1026	1026	1048	879	1005	1034	1100	1009
1034	1020	1012	1048	1034	1100	862	989	1089	1048
1009	1009	1012	1019	1034	1100	879	1000	1078	1050
1019	1019	1012	1034	1090	1034	1026	1034	1019	1009
1005	1048	1048	1026	1034	1109	1026	1000	1100	1009
1005	1058	1034	1009	1048	1102	1034	1009	1112	1050
1034	1026	987	982	1048	1034	1048	1000	1115	1034
1019	1048	979	898	1009	1105	1019	1090	1034	1089
1022	1048	1034	872	1090	1034	1000	1019	1019	1045
1026	1000	1032	1034	1048	1090	1018	1009	1051	1050
1026	1015	1048	1048	1034	1034	1048	1090	1009	1050
1038	1045	1000	1012	1032	1060	1034	1034	990	1034
1034	1034	1021	1011	1034	1090	928	1054	987	1090
928	1045	1006	1054	1034	1110	945	1048	1009	1034
1048	1015	1006	1054	1090	1100	1000	1026	1048	1048
1009	1000	1009	1048	1023	1086	1048	1026	1028	1045
1034	1048	1001	1034	1021	1048	879	1019	928	1048
1000	1079	1090	1019	862	1034	1034	1000	1051	1039
1048	1019	1019	1090	986	1034	1048	980	1009	1034
								Mean	1089.05
								SD	20.47

Table 2D Diameter of DTZ HCl coated pellets C1\*

1132	1123	1143	1132	1110	1118	1100	1121	1122	1100
1100	1132	1132	1100	1121	1132	1110	1132	1122	1110
1122	1132	1120	1114	1122	1132	1132	1134	1122	1119
1134	1134	1146	1132	1121	1132	1132	1131	1132	1119
1132	1132	1145	1143	1132	1145	1110	1130	1133	1123
1130	1100	1140	1123	1134	1148	1119	1100	1132	1118
1121	1110	1156	1134	1132	1132	1110	1110	1132	1132
1132	1119	1167	1119	1132	1112	1132	1132	1121	1132
1134	1119	1154	1119	1130	1110	1121	1132	1100	1132
1131	1123	1132	1120	1121	1132	1122	1146	1113	1145
1130	1118	1110	1134	1132	1123	1132	1145	1122	1148
1100	1132	1121	1132	1134	1121	1134	1140	1119	1146
1110	1132	1122	1100	1131	1146	1132	1156	1123	1145
1132	1132	1121	1110	1130	1145	1100	1167	1121	1140
1132	1145	1132	1119	1100	1140	1110	1154	1132	1156
1134	1148	1134	1119	1110	1115	1119	1132	1100	1167
1130	1132	1145	1123	1132	1116	1119	1110	1114	1154
1131	1100	1123	1118	1132	1154	1123	1121	1132	1132
1100	1100	1118	1132	1121	1132	1118	1122	1130	1110
1100	1120	1110	1132	1132	1110	1132	1121	1121	1121
1120	1128	1110	1132	1134	1121	1132	1132	1132	1122
1128	1132	1119	1145	1112	1122	1132	1134	1134	1121
1131	1134	1132	1148	1119	1121	1145	1122	1131	1132
1129	1130	1134	1146	1134	1132	1148	1119	1130	1134
1132	1128	1110	1145	1132	1134	1132	1123	1100	1123
1145	1132	1121	1140	1100	1121	1131	1121	1110	1120
1131	1123	1122	1156	1110	1132	1121	1132	1132	1132
1130	1110	1119	1167	1119	1134	1131	1100	1132	1131
1120	1132	1123	1154	1119	1131	1132	1114	1134	1110
1123	1134	1121	1132	1123	1130	1130	1132	1132	1110
								Mean	1127.03
								SD	13.13

\*C1 represent for DTZ HCl pellets coated with 10%w/w of Compritol 888 ATO® : EC (1:1)

Table 3D Diameter of DTZ HCl coated pellets C2\*

1148	1165	1145	1150	1165	1148	1154	1145	1145	1143
1145	1150	1143	1160	1145	1150	1145	1155	1152	1142
1150	1152	1145	1154	1143	1145	1143	1161	1147	1142
1165	1145	1152	1155	1148	1148	1145	1134	1148	1145
1145	1165	1147	1150	1148	1150	1152	1150	1148	1149
1149	1145	1145	1147	1148	1148	1147	1148	1148	1154
1161	1148	1148	1149	1150	1150	1148	1134	1150	1145
1145	1148	1143	1150	1145	1143	1148	1145	1145	1143
1148	1148	1152	1150	1148	1134	1148	1145	1148	1145
1148	1148	1150	1150	1150	1161	1150	1150	1150	1152
1148	1165	1143	1142	1148	1145	1145	1161	1148	1147
1148	1155	1148	1142	1150	1148	1148	1145	1150	1148
1145	1150	1148	1145	1143	1148	1150	1148	1143	1148
1154	1145	1148	1149	1132	1148	1148	1148	1148	1148
1150	1143	1148	1154	1151	1148	1150	1148	1151	1150
1145	1156	1148	1145	1145	1145	1143	1148	1145	1145
1165	1148	1150	1143	1150	1154	1145	1145	1155	1148
1145	1148	1145	1145	1148	1150	1143	1154	1143	1150
1143	1148	1148	1152	1142	1145	1145	1150	1161	1148
1148	1149	1150	1147	1142	1165	1152	1145	1145	1150
1151	1150	1148	1161	1145	1145	1147	1165	1148	1143
1151	1149	1150	1145	1149	1143	1145	1145	1148	1161
1145	1142	1143	1148	1154	1143	1148	1143	1148	1145
1143	1148	1145	1148	1145	1145	1143	1142	1148	1148
1150	1148	1145	1148	1143	1160	1152	1142	1145	1148
1150	1142	1149	1148	1145	1155	1150	1145	1154	1148
1148	1142	1150	1145	1152	1142	1143	1149	1150	1148
1145	1145	1155	1154	1147	1142	1148	1154	1145	1145
1150	1149	1165	1150	1148	1145	1134	1145	1165	1154
1145	1154	1154	1145	1148	1149	1143	1143	1145	1150
								Mean	1148.3
								SD	5.2891

\*C2 represent for DTZ HCl pellets coated with 15%w/w of Compritol 888 ATO® : EC (1:1)

Table 4D Diameter of DTZ HCl coated pellets C3\*

1189	1189	1187	1190	1197	1187	1198	1178	1198	1189
1188	1187	1188	1200	1200	1189	1198	1199	1198	1199
1187	1190	1185	1184	1187	1189	1191	1201	1186	1201
1200	1191	1200	1200	1188	1190	1187	1200	1187	1200
1199	1191	1198	1190	1188	1198	1200	1189	1187	1189
1199	1200	1195	1199	1198	1198	1187	1199	1188	1199
1201	1190	1200	1199	1190	1192	1198	1200	1188	1198
1200	1198	1193	1200	1198	1187	1197	1201	1190	1198
1178	1196	1188	1189	1198	1200	1199	1189	1176	1198
1189	1198	1198	1198	1198	1210	1200	1198	1198	1187
1189	1192	1198	1198	1200	1188	1198	1191	1198	1189
1199	1199	1190	1198	1198	1198	1198	1192	1198	1189
1200	1192	1197	1192	1200	1198	1200	1200	1200	1190
1200	1187	1200	1200	1181	1190	1210	1198	1198	1198
1201	1188	1200	1189	1190	1197	1188	1198	1178	1198
1209	1188	1200	1199	1200	1200	1198	1200	1178	1197
1189	1185	1190	1201	1199	1187	1198	1193	1190	1187
1197	1190	1200	1200	1198	1188	1190	1188	1198	1190
1187	1198	1198	1189	1198	1188	1197	1198	1200	1187
1191	1198	1190	1199	1187	1195	1200	1190	1199	1190
1190	1198	1198	1199	1200	1181	1198	1190	1188	1200
1198	1200	1197	1200	1191	1198	1180	1197	1198	1187
1187	1198	1189	1198	1199	1198	1190	1200	1198	1198
1189	1189	1187	1198	1201	1198	1190	1198	1190	1198
1189	1180	1200	1200	1200	1200	1197	1198	1197	1187
1190	1190	1201	1190	1189	1198	1198	1198	1200	1200
1192	1192	1190	1188	1199	1200	1198	1187	1198	1200
1198	1192	1198	1198	1198	1189	1198	1189	1198	1199
1190	1199	1189	1198	1198	1190	1187	1189	1187	1201
1187	1190	1187	1190	1198	1190	1200	1190	1200	1191
								Mean	1194.28
								SD	5.84

\*C3 represent for DTZ HCl pellets coated with 20%w/w of Compritol 888 ATO® : EC (1:1)



Table 5D Diameter of DTZ HCl coated pellets C4\*

1132	1121	1143	1132	1143	1118	1136	1121	1122	1132
1135	1132	1132	1145	1132	1132	1132	1132	1122	1134
1122	1132	1120	1123	1122	1132	1132	1134	1122	1119
1134	1134	1146	1132	1121	1132	1132	1131	1132	1119
1132	1132	1145	1143	1132	1145	1134	1130	1133	1123
1130	1121	1140	1123	1134	1148	1119	1143	1132	1129
1121	1122	1156	1134	1132	1132	1121	1121	1132	1132
1132	1119	1146	1129	1132	1128	1132	1132	1121	1132
1134	1119	1154	1127	1130	1131	1121	1132	1136	1132
1141	1123	1132	1120	1121	1132	1122	1146	1123	1145
1130	1120	1143	1134	1132	1123	1132	1145	1122	1148
1145	1132	1121	1132	1134	1121	1134	1140	1119	1146
1132	1132	1122	1200	1131	1146	1132	1156	1123	1145
1132	1132	1121	1234	1130	1145	1132	1167	1121	1140
1132	1145	1132	1234	1145	1140	1135	1154	1132	1156
1134	1148	1134	1232	1148	1115	1119	1132	1132	1167
1130	1132	1145	1123	1132	1146	1119	1131	1131	1154
1131	1132	1123	1234	1132	1154	1123	1121	1132	1132
1143	1112	1118	1132	1121	1132	1118	1122	1130	1125
1119	1120	1121	1132	1132	1148	1132	1121	1121	1121
1120	1128	1131	1132	1134	1121	1132	1132	1132	1122
1138	1132	1119	1145	1121	1122	1132	1134	1134	1121
1131	1134	1132	1148	1119	1121	1145	1122	1131	1132
1129	1130	1134	1146	1134	1132	1148	1132	1130	1134
1132	1128	1141	1145	1132	1134	1132	1123	1121	1123
1145	1132	1142	1140	1143	1121	1131	1121	1121	1120
1131	1123	1122	1156	1121	1132	1121	1132	1132	1132
1130	1132	1119	1167	1119	1134	1131	1148	1132	1131
1131	1132	1123	1154	1119	1131	1132	1121	1134	1145
1125	1134	1121	1132	1123	1130	1130	1132	1132	1146
								Mean	1133.4
								SD	15.61

\*C4 represent for DTZ HCl pellets coated with 10%w/w of Compritol 888 ATO® : EC (2:1)

Table 6D Diameter of DTZ HCl coated pellets C5\*

1151	1165	1145	1150	1165	1148	1154	1145	1145	1150
1148	1150	1153	1160	1145	1150	1145	1155	1152	1152
1150	1152	1146	1154	1156	1145	1152	1161	1147	1150
1165	1153	1152	1155	1148	1148	1145	1150	1148	1145
1146	1165	1149	1150	1148	1150	1152	1150	1148	1149
1149	1160	1145	1147	1148	1148	1147	1148	1148	1154
1161	1148	1148	1149	1150	1150	1148	1151	1150	1145
1145	1148	1143	1150	1145	1150	1148	1145	1145	1143
1148	1148	1152	1150	1148	1154	1148	1145	1148	1145
1151	1148	1150	1150	1150	1161	1150	1150	1150	1152
1150	1165	1151	1142	1148	1145	1145	1161	1148	1147
1148	1155	1148	1162	1150	1148	1148	1145	1150	1148
1153	1150	1148	1145	1143	1148	1150	1148	1150	1148
1154	1145	1148	1149	1152	1148	1148	1148	1148	1148
1150	1149	1148	1154	1151	1148	1150	1148	1151	1150
1156	1156	1148	1145	1145	1145	1161	1148	1145	1145
1165	1148	1150	1143	1150	1154	1145	1145	1155	1148
1145	1148	1145	1145	1148	1150	1161	1154	1151	1150
1152	1148	1148	1152	1148	1145	1145	1150	1161	1148
1148	1149	1150	1147	1142	1165	1152	1145	1145	1150
1151	1150	1148	1161	1145	1145	1147	1165	1148	1151
1161	1149	1150	1145	1149	1143	1145	1145	1148	1161
1145	1147	1153	1148	1154	1147	1148	1154	1148	1145
1161	1148	1145	1148	1145	1145	1152	1152	1148	1148
1150	1148	1145	1148	1152	1160	1152	1150	1145	1148
1150	1152	1149	1148	1145	1155	1150	1145	1154	1148
1148	1152	1150	1145	1152	1142	1150	1149	1150	1148
1145	1145	1155	1154	1147	1150	1148	1154	1145	1145
1150	1149	1165	1150	1148	1145	1154	1145	1165	1154
1145	1154	1154	1145	1148	1149	1143	1153	1145	1150
								Mean	1149.79
								SD	4.86

\*C5 represent for DTZ HCl pellets coated with 15%w/w of Compritol 888 ATO® : EC (2:1)

Table 7D Diameter of DTZ HCl coated pellets C6\*

1198	1189	1187	1190	1197	1187	1198	1178	1198	1178
1198	1187	1188	1200	1200	1189	1198	1199	1198	1199
1187	1190	1178	1212	1187	1189	1178	1201	1178	1201
1200	1200	1200	1200	1188	1190	1187	1200	1187	1200
1178	1200	1198	1190	1188	1198	1200	1189	1187	1189
1199	1215	1198	1199	1176	1198	1187	1199	1188	1199
1201	1211	1200	1199	1176	1178	1198	1200	1188	1198
1200	1198	1210	1200	1198	1187	1197	1201	1176	1198
1189	1196	1188	1189	1198	1200	1199	1189	1176	1198
1199	1198	1198	1198	1198	1210	1200	1198	1198	1187
1199	1198	1198	1198	1200	1188	1198	1198	1198	1189
1199	1199	1190	1198	1198	1198	1198	1198	1198	1189
1200	1178	1197	1187	1178	1198	1200	1200	1200	1190
1200	1187	1200	1200	1178	1190	1210	1198	1198	1198
1212	1188	1200	1178	1190	1197	1188	1198	1178	1198
1210	1188	1221	1199	1200	1200	1198	1200	1178	1178
1198	1176	1215	1201	1199	1187	1198	1210	1190	1187
1196	1176	1200	1200	1198	1188	1190	1188	1198	1190
1187	1198	1198	1189	1198	1188	1197	1198	1200	1187
1198	1198	1190	1199	1187	1176	1200	1198	1210	1190
1198	1198	1198	1199	1200	1176	1198	1190	1188	1200
1198	1200	1197	1200	1178	1198	1180	1197	1198	1187
1187	1198	1189	1198	1199	1198	1190	1200	1198	1198
1189	1178	1187	1198	1201	1198	1190	1198	1190	1198
1189	1178	1200	1200	1200	1200	1197	1198	1197	1187
1190	1190	1201	1210	1189	1198	1198	1198	1200	1200
1198	1192	1190	1188	1199	1178	1198	1187	1198	1178
1198	1192	1198	1198	1198	1178	1198	1189	1198	1199
1178	1199	1189	1198	1198	1190	1187	1189	1187	1201
1187	1190	1187	1190	1198	1190	1200	1190	1200	1200
								Mean	1194.23
								SD	8.01

\*C6 represent for DTZ HCl pellets coated with 20%w/w of Compritol 888 ATO<sup>®</sup> : EC (2:1)



Table 8D Diameter of DTZ HCl coated pellets C7\*

1122	1123	1143	1132	1156	1138	1120	1121	1122	1120
1100	1132	1132	1134	1121	1132	1132	1132	1122	1121
1125	1132	1120	1142	1122	1132	1132	1134	1122	1119
1136	1134	1146	1132	1121	1132	1132	1131	1132	1119
1132	1132	1145	1143	1132	1145	1145	1130	1133	1123
1130	1129	1140	1123	1134	1148	1119	1131	1132	1129
1121	1130	1156	1134	1132	1132	1139	1120	1132	1132
1138	1119	1145	1119	1132	1132	1132	1132	1121	1132
1134	1119	1154	1119	1130	1132	1121	1132	1142	1132
1131	1123	1132	1120	1121	1132	1122	1146	1123	1145
1130	1120	1156	1134	1132	1123	1132	1145	1122	1148
1138	1132	1121	1132	1134	1121	1134	1140	1119	1146
1115	1132	1122	1134	1131	1146	1132	1156	1123	1145
1132	1132	1121	1145	1130	1145	1120	1147	1121	1140
1132	1145	1132	1119	1121	1140	1132	1154	1132	1156
1134	1148	1134	1119	1121	1124	1119	1132	1132	1129
1130	1132	1145	1123	1132	1116	1119	1132	1134	1154
1131	1129	1123	1118	1132	1154	1123	1121	1132	1132
1125	1123	1138	1132	1121	1132	1118	1122	1130	1130
1128	1120	1128	1132	1132	1131	1132	1121	1121	1121
1120	1128	1135	1136	1134	1121	1132	1132	1132	1122
1128	1132	1123	1145	1131	1122	1132	1134	1134	1121
1131	1134	1132	1148	1119	1121	1145	1122	1131	1132
1129	1130	1134	1146	1134	1132	1148	1119	1130	1134
1132	1128	1145	1145	1132	1134	1132	1123	1145	1123
1145	1132	1121	1140	1130	1121	1131	1121	1132	1120
1131	1123	1122	1156	1130	1132	1121	1132	1132	1132
1130	1109	1134	1158	1119	1134	1131	1120	1132	1131
1139	1132	1123	1154	1119	1131	1132	1114	1134	1121
1132	1134	1121	1132	1123	1130	1130	1132	1132	1132
								Mean	1130.93
								SD	9.37

\*C7 represent for DTZ HCl pellets coated with 10%w/w of Compritol 888 ATO® : EC (3:1)



Table 9D Diameter of DTZ HCl coated pellets C8\*

1149	1151	1145	1150	1155	1148	1154	1145	1145	1145
1151	1150	1153	1155	1145	1150	1145	1155	1152	1152
1150	1152	1145	1154	1156	1155	1149	1161	1147	1160
1165	1145	1152	1155	1148	1148	1145	1153	1148	1145
1161	1158	1147	1150	1148	1150	1152	1150	1148	1149
1149	1145	1145	1147	1148	1148	1147	1148	1148	1154
1161	1148	1148	1149	1150	1150	1148	1148	1150	1145
1143	1148	1153	1150	1145	1160	1148	1145	1145	1153
1142	1148	1152	1150	1148	1153	1148	1145	1148	1145
1148	1148	1150	1150	1150	1161	1150	1150	1150	1152
1148	1155	1150	1159	1148	1145	1145	1161	1148	1147
1148	1155	1148	1147	1150	1148	1148	1145	1150	1148
1145	1150	1148	1145	1153	1148	1150	1148	1153	1148
1154	1145	1148	1149	1145	1148	1148	1148	1148	1148
1150	1153	1148	1154	1151	1148	1150	1148	1151	1150
1145	1156	1148	1145	1145	1145	1154	1148	1145	1145
1145	1148	1150	1153	1150	1154	1145	1145	1155	1148
1145	1148	1145	1145	1148	1150	1150	1154	1153	1150
1143	1148	1148	1152	1155	1145	1145	1150	1161	1148
1148	1149	1150	1147	1154	1159	1152	1145	1145	1150
1152	1150	1148	1161	1145	1145	1147	1155	1148	1150
1151	1149	1150	1145	1149	1161	1145	1145	1148	1161
1145	1152	1153	1148	1154	1145	1148	1156	1148	1145
1148	1148	1145	1148	1145	1145	1153	1148	1148	1148
1150	1148	1145	1148	1156	1160	1152	1148	1145	1148
1150	1153	1149	1148	1145	1155	1150	1145	1154	1148
1148	1147	1150	1145	1152	1152	1150	1149	1150	1148
1145	1155	1155	1154	1147	1152	1148	1154	1145	1149
1150	1149	1151	1150	1148	1145	1160	1145	1148	1154
1145	1154	1154	1145	1148	1149	1156	1160	1145	1150
								Mean	1149.61
								SD	4.14

\*C8 represent for DTZ HCl pellets coated with 15%w/w of Compritol 888 ATO® : EC (3:1)

Table 10D Diameter of DTZ HCl coated pellets C9\*

1191	1189	1187	1190	1197	1187	1198	1191	1198	1198
1191	1187	1188	1200	1200	1189	1198	1199	1198	1199
1187	1190	1189	1192	1187	1189	1191	1201	1191	1201
1200	1200	1200	1200	1188	1190	1187	1200	1190	1200
1187	1200	1198	1190	1188	1198	1200	1189	1187	1189
1195	1205	1198	1199	1198	1198	1187	1199	1188	1199
1201	1200	1200	1199	1190	1190	1198	1200	1188	1198
1200	1198	1210	1200	1198	1187	1197	1201	1190	1191
1189	1196	1188	1189	1198	1200	1199	1189	1190	1198
1191	1198	1198	1198	1198	1210	1200	1198	1198	1187
1199	1198	1198	1198	1200	1188	1198	1198	1198	1189
1199	1199	1190	1191	1198	1198	1198	1198	1198	1189
1198	1189	1197	1187	1190	1198	1200	1200	1200	1190
1200	1187	1200	1200	1190	1190	1201	1198	1198	1198
1200	1188	1200	1190	1190	1197	1188	1198	1198	1198
1191	1188	1201	1199	1200	1200	1198	1200	1198	1191
1198	1192	1198	1201	1199	1187	1198	1191	1190	1190
1196	1190	1200	1200	1198	1188	1190	1188	1198	1190
1193	1198	1198	1195	1198	1188	1197	1198	1200	1187
1198	1198	1190	1199	1187	1199	1200	1198	1201	1190
1198	1198	1198	1199	1200	1199	1198	1190	1188	1200
1198	1200	1197	1200	1200	1198	1180	1197	1198	1187
1191	1198	1189	1198	1199	1198	1190	1200	1198	1198
1189	1181	1187	1198	1201	1198	1190	1198	1190	1198
1189	1198	1200	1200	1200	1200	1197	1198	1197	1187
1190	1190	1201	1190	1189	1198	1198	1198	1200	1200
1198	1192	1190	1188	1199	1189	1198	1187	1198	1191
1198	1192	1198	1198	1198	1190	1198	1189	1198	1199
1198	1199	1189	1198	1198	1190	1187	1189	1187	1201
1187	1190	1187	1190	1198	1190	1200	1190	1200	1191
								Mean	1195.02
								SD	5.13

\*C9 represent for DTZ HCl pellets coated with 20%w/w of Compritol 888 ATO<sup>®</sup> : EC (3:1)

Table 11D Diameter of DTZ HCl coated pellets C10\*

1132	1123	1132	1132	1132	1129	1142	1121	1122	1132
1132	1132	1132	1141	1121	1132	1132	1132	1122	1132
1122	1132	1120	1139	1122	1132	1132	1134	1122	1119
1134	1134	1131	1132	1121	1132	1132	1131	1132	1119
1132	1132	1130	1143	1132	1130	1132	1130	1133	1123
1130	1136	1130	1123	1134	1148	1119	1126	1132	1118
1135	1120	1132	1134	1132	1132	1129	1125	1132	1132
1132	1119	1130	1129	1132	1129	1132	1132	1121	1132
1134	1119	1134	1119	1130	1124	1121	1132	1135	1132
1131	1123	1132	1120	1121	1132	1122	1146	1130	1145
1130	1132	1129	1134	1132	1123	1132	1145	1122	1148
1128	1132	1121	1132	1134	1121	1134	1140	1119	1146
1125	1132	1122	1139	1131	1146	1132	1132	1123	1145
1132	1132	1121	1126	1130	1145	1132	1127	1121	1140
1132	1130	1132	1119	1132	1140	1130	1154	1132	1156
1134	1132	1134	1119	1129	1145	1119	1132	1132	1132
1130	1132	1139	1123	1132	1131	1119	1137	1135	1154
1131	1132	1139	1126	1132	1130	1123	1121	1132	1132
1137	1130	1139	1132	1121	1132	1120	1122	1130	1132
1132	1120	1132	1132	1132	1132	1132	1121	1121	1121
1126	1128	1136	1132	1134	1121	1132	1132	1132	1122
1128	1132	1136	1135	1130	1122	1132	1134	1134	1121
1131	1134	1132	1148	1119	1121	1145	1122	1131	1132
1129	1130	1134	1146	1134	1132	1141	1119	1130	1134
1132	1128	1129	1145	1132	1134	1132	1123	1135	1123
1134	1132	1121	1140	1129	1121	1131	1121	1138	1120
1131	1123	1122	1132	1134	1132	1121	1132	1132	1132
1130	1131	1139	1147	1129	1134	1131	1129	1132	1131
1120	1132	1123	1141	1119	1131	1132	1130	1134	1137
1123	1134	1121	1132	1123	1130	1130	1132	1132	1132
								Mean	1130.50
								SD	6.97

\*C10 represent for DTZ HCl pellets coated with 10%w/w of Compritol 888 ATO® : EC (4:1)



Table 12D Diameter of DTZ HCl coated pellets C11\*

1148	1158	1145	1150	1151	1148	1154	1145	1145	1156
1152	1150	1155	1160	1145	1150	1145	1155	1152	1151
1158	1152	1145	1154	1153	1148	1148	1161	1147	1155
1165	1155	1152	1155	1148	1148	1145	1148	1148	1145
1145	1152	1147	1150	1148	1150	1152	1150	1148	1149
1149	1150	1145	1147	1148	1148	1147	1148	1148	1154
1161	1148	1148	1149	1150	1150	1148	1154	1150	1145
1150	1148	1153	1150	1145	1149	1148	1145	1145	1153
1148	1148	1152	1150	1148	1144	1148	1145	1148	1145
1148	1148	1150	1150	1150	1161	1150	1150	1150	1152
1148	1155	1155	1149	1148	1145	1145	1161	1148	1147
1148	1155	1148	1150	1150	1148	1148	1145	1150	1148
1150	1150	1148	1145	1152	1148	1150	1148	1159	1148
1154	1145	1148	1149	1161	1148	1148	1148	1148	1148
1150	1149	1148	1154	1151	1148	1150	1148	1151	1150
1152	1156	1148	1145	1145	1145	1151	1148	1145	1145
1150	1148	1150	1159	1150	1154	1145	1145	1155	1148
1145	1148	1159	1145	1148	1150	1151	1154	1149	1150
1153	1148	1148	1152	1152	1145	1145	1150	1161	1148
1148	1149	1150	1147	1149	1155	1152	1145	1145	1150
1151	1150	1148	1161	1145	1145	1147	1151	1148	1147
1151	1149	1150	1145	1149	1153	1145	1145	1148	1161
1145	1151	1155	1148	1154	1143	1148	1153	1148	1145
1150	1148	1145	1148	1145	1145	1148	1150	1148	1148
1150	1148	1145	1148	1151	1160	1152	1150	1145	1148
1150	1150	1149	1148	1145	1155	1150	1145	1154	1148
1148	1150	1150	1145	1152	1151	1152	1149	1150	1148
1153	1151	1155	1154	1147	1154	1148	1154	1145	1145
1150	1149	1155	1150	1148	1145	1145	1145	1150	1154
1145	1154	1154	1145	1148	1149	1148	1150	1145	1150
									Mean 1149.60
									SD 3.86

\*C11 represent for DTZ HCl pellets coated with 15%w/w of Compritol 888 ATO® : EC (4:1)



Table 13D Diameter of DTZ HCl coated pellets C12\*

1198	1189	1187	1190	1197	1187	1198	1209	1198	1198
1198	1199	1188	1200	1200	1189	1198	1199	1198	1199
1201	1190	1198	1212	1209	1189	1190	1201	1200	1201
1189	1200	1200	1200	1188	1190	1187	1200	1187	1200
1190	1200	1198	1190	1188	1198	1200	1189	1198	1189
1199	1215	1198	1199	1199	1198	1187	1199	1188	1199
1201	1211	1200	1199	1189	1190	1198	1200	1188	1198
1200	1198	1210	1200	1198	1187	1197	1201	1198	1198
1198	1196	1200	1189	1198	1200	1199	1189	1205	1198
1199	1198	1198	1198	1198	1210	1200	1198	1198	1187
1199	1198	1198	1198	1200	1200	1198	1198	1198	1189
1199	1199	1199	1198	1198	1198	1198	1198	1198	1189
1200	1211	1197	1199	1200	1198	1200	1200	1200	1190
1200	1212	1200	1200	1200	1190	1210	1198	1198	1198
1212	1188	1200	1199	1190	1197	1188	1198	1199	1198
1210	1188	1221	1199	1200	1200	1198	1200	1200	1178
1198	1199	1215	1201	1199	1187	1198	1210	1190	1187
1196	1198	1200	1200	1198	1188	1190	1188	1198	1190
1216	1198	1198	1189	1198	1188	1197	1198	1200	1187
1216	1198	1190	1199	1209	1185	1200	1198	1210	1190
1198	1198	1198	1199	1200	1195	1198	1190	1188	1200
1198	1200	1197	1200	1199	1198	1180	1197	1198	1187
1220	1198	1221	1198	1199	1198	1190	1200	1198	1198
1189	1201	1187	1198	1201	1198	1190	1198	1190	1198
1198	1209	1200	1200	1200	1200	1197	1198	1197	1187
1190	1190	1201	1210	1189	1198	1198	1198	1200	1200
1198	1192	1190	1188	1199	1198	1198	1187	1198	1190
1198	1192	1198	1198	1198	1190	1198	1189	1198	1199
1198	1199	1189	1198	1198	1190	1187	1189	1187	1201
1187	1190	1200	1190	1198	1190	1200	1190	1200	1200
								Mean	1197.07
								SD	6.56

\*C12 represent for DTZ HCl pellets coated with 20%w/w of Compritol 888 ATO® : EC (4:1)

## VITAE

Miss Warapun Lekrut was born on February 17, 1976 in Nakhon Sawan, Thailand. She received her Bachelor of Science in Pharmacy with second class honor from Faculty of Pharmacy, Rangsit University, Bangkok, Thailand in 1998. After graduation, she entered the Master's Degree program in Manufacturing Pharmacy at Chulalongkorn University.