Annex A

Impact of the proposed rebate/surcharge mechanism

No-loss scenario – No bank failure occurs in the illustration period.

Moderate-loss scenario – Bank failure occurs on a moderate scale. Timing of loss is assumed to occur each year and the cost to the DIS fund is at expected loss level.

Large-loss – Bank failure for two consecutive years in year 4,5 and 11,12. The magnitude of failure in each year is equivalent to the middle four banks in the mid-size bank category.

Figures assume that there is no growth in deposits and that the target fund size remains constant.

Description of mechanism:

Surcharges and rebates will kick in when the fund balance as at the end of the previous year is outside the target range. The amount of rebate/surcharge is 30% of the difference between the actual fund size and the target fund size. An aggregate annual premium of 8 basis points would be charged during the fund build-up period. After this, the expected loss premium would be charged.

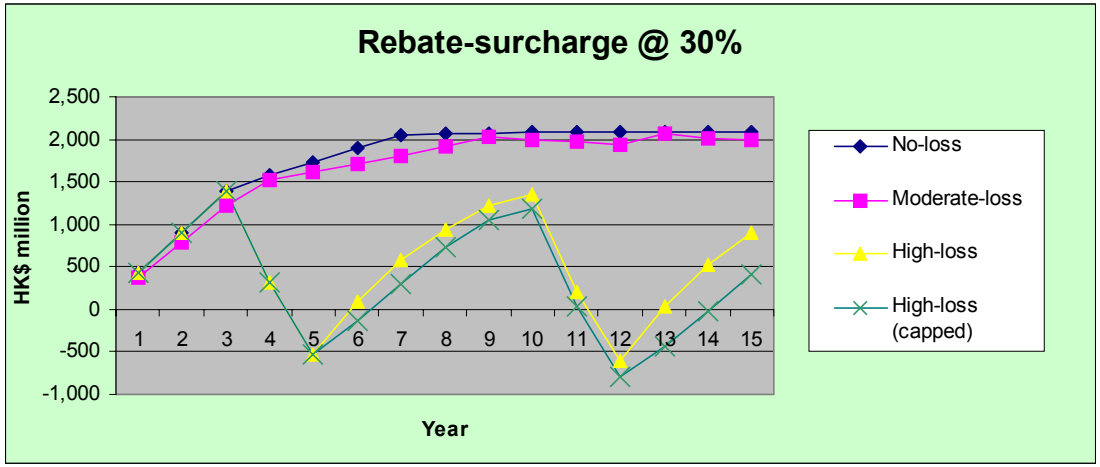
When the fund size falls below the lower limit of the target range, surcharges would kick in to bring the fund back towards the target fund size. However, surcharges would not kick in during the fund build-up period so as to avoid surcharges and build-up premium being charged at the same time. A cap of 8 basis points applicable to surcharge and the aggregate annual premium is also shown to illustrate the impact it has on the fund size. The trend in growth of the DIS fund under the three loss scenarios is shown in the attached table and chart below.

Observation :

The chart shows that the fund size would flatten near the upper limit for the no-loss and moderate-loss scenarios but would fluctuate more widely under the high-loss scenario (the fund becomes insolvent in years 5 and 12). Surcharge plus annual premium would exceed 8 basis points (premium level at build up period) in years 6,7,13 and 14 if a cap is not in place. The figures in the attached table shows that in year 13 surcharge inclusive of annual premium would be 12.6 basis points.

Annex A

If the cap of 8 basis points is in place, it would apply in years 6, 7 and years 12 to 15 inclusive (see attached table). With the surcharge being capped the fund would remain insolvent for a longer period i.e. in years 5,6,12,13 and 14 (as opposed to years 5 and 12 only). The effect is illustrated in the graph below. The attached table gives the actual amounts.



Rebate and surcharge - static position

Figures in HK$ million

	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6	Year 7	Year 8	Year 9	Year 10	Year 11	Year 12	Year 13	Year 14	Year 15
Upper limit of the fund	1,950.00	1,950.00	1,950.00	1,950.00	1,950.00	1,950.00	1,950.00	1,950.00	1,950.00	1,950.00	1,950.00	1,950.00	1,950.00	1,950.00	1,950.00
Target fund size	1,500.00	1,500.00	1,500.00	1,500.00	1,500.00	1,500.00	1,500.00	1,500.00	1,500.00	1,500.00	1,500.00	1,500.00	1,500.00	1,500.00	1,500.00
Lower limit of the fund	1,050.00	1,050.00	1,050.00	1,050.00	1,050.00	1,050.00	1,050.00	1,050.00	1,050.00	1,050.00	1,050.00	1,050.00	1,050.00	1,050.00	1,050.00
Insured deposits	544,356.00	544,356.00	544,356.00	544,356.00	544,356.00	544,356.00	544,356.00	544,356.00	544,356.00	544,356.00	544,356.00	544,356.00	544,356.00	544,356.00	544,356.00
No-loss															
Opening balance	0.00	435.48	897.10	1,386.41	1,583.18	1,731.48	1,888.67	2,055.29	2,065.33	2,072.95	2,078.75	2,083.15	2,086.50	2,089.04	2,090.97
Premium	435.48	435.48	435.48	113.59	53.30	53.30	53.30	53.30	53.30	53.30	53.30	53.30	53.30	53.30	53.30
Investment income	0.00	26.13	53.83	83.18	94.99	103.89	113.32	123.32	123.92	124.38	124.72	124.99	125.19	125.34	125.46
Surcharge/(Rebate)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-166.59	-169.60	-171.89	-173.62	-174.94	-175.95	-176.71	-177.29
Closing balance	435.48	897.10	1,386.41	1,583.18	1,731.48	1,888.67	2,055.29	2,065.33	2,072.95	2,078.75	2,083.15	2,086.50	2,089.04	2,090.97	2,092.44
Moderate-loss															
Opening balance	0.00	382.18	787.29	1,216.71	1,519.70	1,610.88	1,707.53	1,809.99	1,918.59	2,033.70	1,995.61	1,966.67	1,944.67	2,061.35	2,016.62
Premium	435.48	435.48	435.48	283.29	53.30	53.30	53.30	53.30	53.30	53.30	53.30	53.30	53.30	53.30	53.30
Investment income	0.00	22.93	47.24	73.00	91.18	96.65	102.45	108.60	115.12	122.02	119.74	118.00	116.68	123.68	121.00
Loss	-53.30	-53.30	-53.30	-53.30	-53.30	-53.30	-53.30	-53.30	-53.30	-53.30	-53.30	-53.30	-53.30	-53.30	-53.30
Surcharge/(Rebate)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-160.11	-148.68	-140.00	0.00	-168.40	-154.99
Closing balance	382.18	787.29	1,216.71	1,519.70	1,610.88	1,707.53	1,809.99	1,918.59	2,033.70	1,995.61	1,966.67	1,944.67	2,061.35	2,016.62	1,982.63
High-loss (No cap)															
Opening balance	0.00	435.48	897.10	1,386.41	316.45	-522.93	95.42	575.82	940.93	1,218.41	1,344.81	212.07	-602.26	33.54	528.79
Premium	435.48	435.48	435.48	113.59	53.30	53.30	53.30	53.30	53.30	53.30	53.30	53.30	53.30	53.30	53.30
Investment income	0.00	26.13	53.83	83.18	18.99	-41.83	5.72	34.55	56.46	73.10	80.69	12.72	-48.18	2.01	31.73
Loss	0.00	0.00	0.00	-1,266.74	-1,266.74	0.00	0.00	0.00	0.00	0.00	-1,266.74	-1,266.74	0.00	0.00	0.00
Surcharge/(Rebate)	0.00	0.00	0.00	0.00	355.07	606.88	421.38	277.25	167.72	0.00	0.00	386.38	630.68	439.94	291.36
Closing balance	435.48	897.10	1,386.41	316.45	-522.93	95.42	575.82	940.93	1,218.41	1,344.81	212.07	-602.26	33.54	528.79	905.19
High-loss (Capped)															
Opening balance	0.00	435.48	897.10	1,386.41	316.45	-522.93	-129.28	295.86	728.16	1,056.70	1,173.41	30.38	-799.05	-427.49	-26.20
Premium	435.48	435.48	435.48	113.59	53.30	53.30	53.30	53.30	53.30	53.30	53.30	53.30	53.30	53.30	53.30
Investment income	0.00	26.13	53.83	83.18	18.99	-41.83	-10.34	17.75	43.69	63.40	70.40	1.82	-63.92	-34.20	-2.10
Loss	0.00	0.00	0.00	-1,266.74	-1,266.74	0.00	0.00	0.00	0.00	0.00	-1,266.74	-1,266.74	0.00	0.00	0.00
Surcharge-capped at 8bp/(Rebate)	0.00	0.00	0.00	0.00	355.07	*382.18*	*382.18*	361.24	231.55	0.00	0.00	*382.18*	*382.18*	*382.18*	*382.18*
Closing balance	435.48	897.10	1,386.41	316.45	-522.93	-129.28	295.86	728.16	1,056.70	1,173.41	30.38	-799.05	-427.49	-26.20	407.19

Note:

	Year in which target fund size is reached
Italics	Surcharge (including premium on expected loss) capped at 8 bp