



Correction to: Predicting customer churn for platform businesses: using latent variables of variational autoencoder as consumers' purchasing behavior

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In this online published article, a format of few entries of Tables 4 to 7 were corrected.

The Corrected tables were given below (Tables 4, 5, 6, 7):

Table 4 Feature importance (Gamma-VAE $K = 14$)

#	Feature	Feature Importance
1	R	0.3715
2	I	0.0691
3	Z_5	0.0499
4	S	0.0492
5	Z_{14}	0.0448
6	M	0.0444
7	F	0.0374
8	Z_3	0.0354
9	Z_{11}	0.0348
10	T	0.0343
11	Z_9	0.0332
12	Z_2	0.0315
13	Z_1	0.0238
14	Z_7	0.0220
15	Z_{10}	0.0219
16	Z_6	0.0214
17	Z_8	0.0193
18	Z_{12}	0.0190
19	Z_{13}	0.0186
20	Z_4	0.0186

The original article can be found online at <https://doi.org/10.1007/s00521-022-07418-8>.

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Table 5 Feature importance (Gauss-VAE K = 14)

#	Feature	Feature Importance
1	R	0.4146
2	I	0.0672
3	Z ₃	0.0661
4	Z ₁₂	0.0494
5	S	0.0464
6	M	0.0445
7	Z ₆	0.0418
8	T	0.0376
9	Z ₁₄	0.0288
10	F	0.0286
11	Z ₁₃	0.0213
12	Z ₅	0.0213
13	Z ₂	0.0196
14	Z ₁	0.0183
15	Z ₁₁	0.0175
16	Z ₁₀	0.0171
17	Z ₇	0.0166
18	Z ₄	0.0148
19	Z ₈	0.0146
20	Z ₉	0.0139

Table 6 Cohort analysis summary

Cohort	Average Score							Number of Customers			
	Avg. CLV	Avg. R	Avg. F	Avg. M	Avg. S	Avg. T	Avg. I	#Non-Churne	#Churner	Total Customers	ChurnRate
Top 10% of Z ₅ (Gamma)	0.00595	0.60576	0.01006	0.01071	0.00541	0.81444	0.34951	200	760	960	79.17%
Bottom 10% of Z ₅ (Gamma)	0.11844	0.12159	0.04786	0.08951	0.01747	0.74842	0.13047	706	254	960	26.46%
Top 10% of Z ₃ (Gauss)	0.00522	0.62823	0.01001	0.01094	0.00535	0.81421	0.34283	178	782	960	81.46%
Bottom 10% of Z ₃ (Gauss)	0.12226	0.12175	0.04892	0.08969	0.01795	0.74878	0.12698	710	250	960	26.04%

Table 7 Top 5 purchased store categories by cohorts

Top 10% of Z ₅ (Gamma)		Bottom 10% of Z ₅ (Gamma)		Top 10% of Z ₃ (Gauss)		Bottom 10% of Z ₃ (Gauss)	
Units	Amounts	Units	Amounts	Units	Amounts	Units	Amounts
Digital Contents 1	Fashion 1	Digital Contents 1	Fashion 1	Digital Contents 1	Service 3	Digital Contents 1	Fashion 1
Digital Contents 3	Service 3	Digital Contents 2	Service 3	Service 3	Fashion 1	Hobby 4	Service 4
Electronics 1	Digital Contents 2	Hobby 4	Service 4	Digital Contents 3	Digital Contents 1	Digital Contents 2	Digital Contents 1
Digital Contents 2	Electronics 2	Service 3	Service 6	Electronics 1	Digital Contents 3	Digital Contents 3	Service 6
Hobby 4	Travel	Digital Contents 3	Electronics 2	Media 2	Electronics 2	Fashion 1	Electronics 2

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