**The relationship between negative symptoms and cognitive function in schizophrenia**

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**Supplementary Material**

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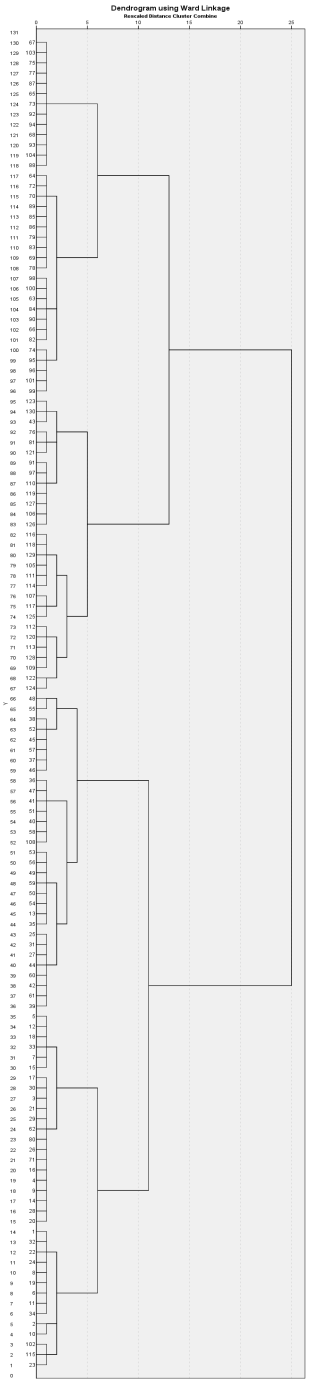
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**Supplementary Table 1.** Comparison of SANS/SAPS scores across emergent cluster subgroups

|  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  | Cluster 1 | Cluster 2 | Cluster 3 | Cluster 4 |  |  | |  | |  | |  | |  | |  | |
|  | High Hallucinations | Low Affective/Alogia High Everything | High Negative Symptoms | Asymptomatic |  | 1 vs. 2 | | 1 vs. 3 | | 1 vs. 4 | | 2 vs. 3 | | 2 vs. 4 | | 3 vs. 4 | |
|  | (*n*=34) | (*n*=27) | (*n*=26) | (*n*=43) | Test Statistic | d | p | d | p | d | p | d | p | d | p | d | p |
| DEL | 2.2 (1.4) | 3.7 (0.9) | 2.0 (1.5) | 1.1 (1.6) | *F*3,110.8 = 20.7,  *p* < 0.001a | 1.3 | <0.01 | 0.1 | 0.96 | 0.7 | 0.01 | 1.4 | <0.01 | 2.0 | <0.01 | 0.6 | 0.13 |
| HAL | 3.8 (0.8) | 3.6 (1.0) | 0.7 (1.1) | 0.2 (0.6) | *F*3,84.9 = 144.3,  *p* < 0.001a | 0.2 | 0.89 | 3.2 | <0.01 | 5.1 | <0.01 | 2.8 | <0.01 | 4.1 | <0.01 | 0.6 | 0.22 |
| AF | 1.4 (1.5) | 1.2 (1.5) | 2.6 (1.3) | 1.0 (1.1) | *F*3,107.8 = 7.7,  *p* < 0.001a | 0.1 | 0.99 | 0.9 | 0.01 | 0.3 | 0.71 | 1.0 | 0.01 | 0.2 | 0.91 | 1.3 | <0.01 |
| AL | 0.6 (0.9) | 1.0 (1.1) | 2.1 (1.4) | 0.6 (1.0) | *F*3,126 = 13.3,  *p* < 0.001 | 0.4 | 0.48 | 1.3 | <0.01 | 0.0 | 1.00 | 0.9 | 0.01 | 0.4 | 0.45 | 1.2 | <0.01 |
| An-As | 0.4 (0.8) | 3.1 (0.9) | 3.0 (1.0) | 0.3 (0.6) | *F*3,91.9 = 108.2,  *p* < 0.001a | 3.2 | <0.01 | 2.9 | <0.01 | 0.1 | 0.98 | 0.1 | 0.99 | 3.7 | <0.01 | 3.3 | <0.01 |
| Av-Ap | 0.5 (0.9) | 1.4 (1.2) | 1.8 (1.5) | 0.3 (0.7) | *F*3,80.3 = 13.4,  *p* < 0.001a | 0.9 | 0.01 | 1.1 | <0.01 | 0.3 | 0.75 | 0.3 | 0.58 | 1.1 | <0.01 | 1.3 | <0.01 |

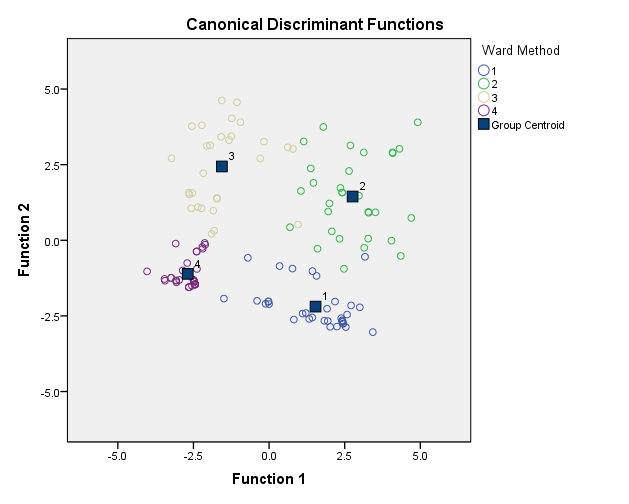
Data were reported as mean (SD) unless otherwise stated. aBrown-Forsythe F-ratio reported. DEL: SAPS Delusions; SAPS HAL: Hallucinations; FA: SANS Affective Flattening; AL: SANS Alogia; An-As: SANS Anhedonia-Asociality; Av-Ap: SANS Avolition-Apathy

**Figure S1.** Agglomeration schedule

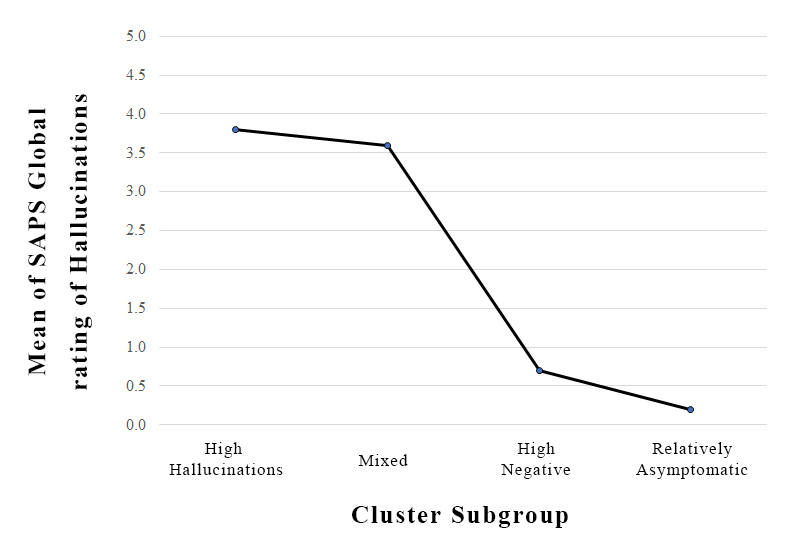
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**Figure S2.** Dendrogram of cluster solution.

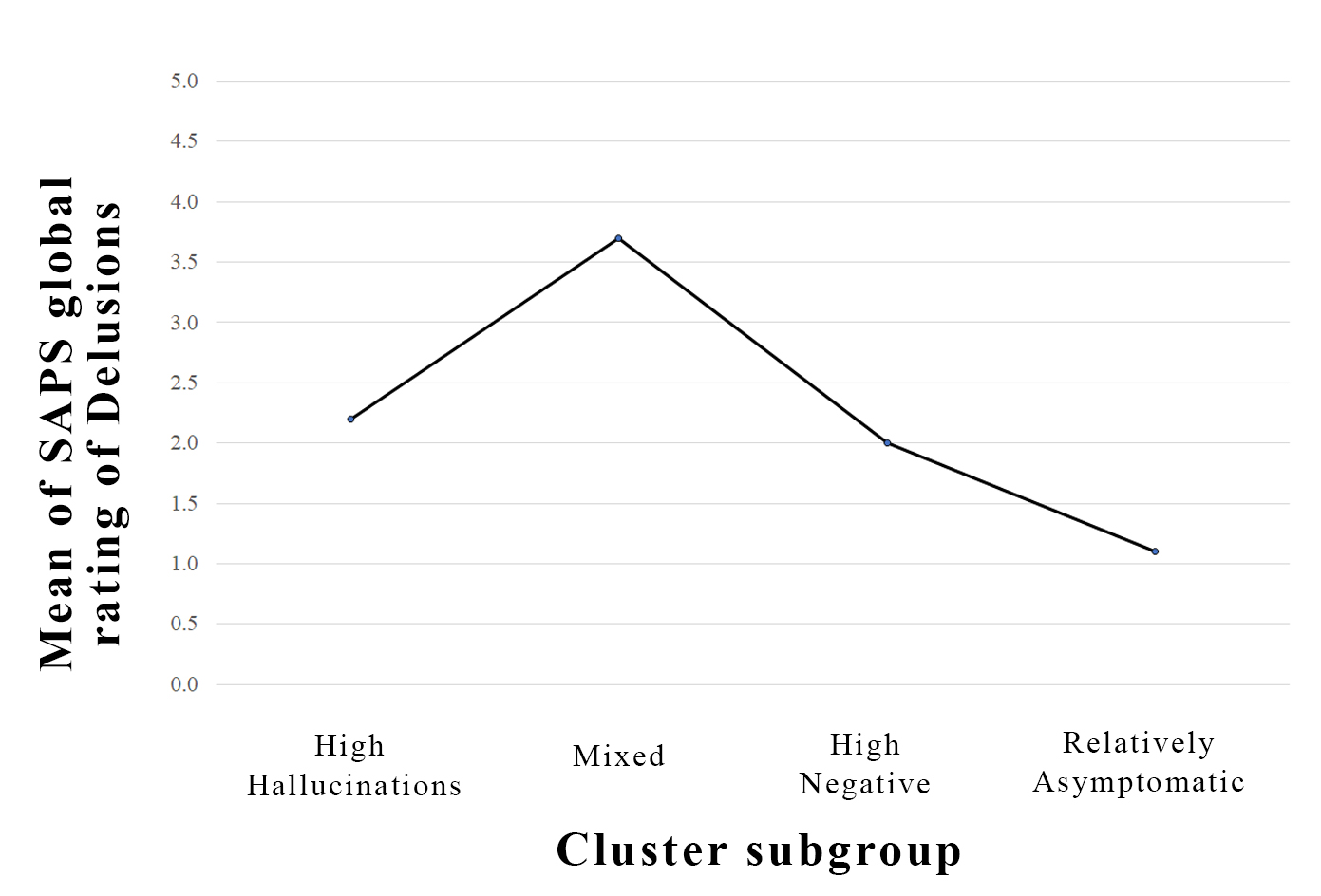
**Figure S3.** Canonical discriminant functions plot.



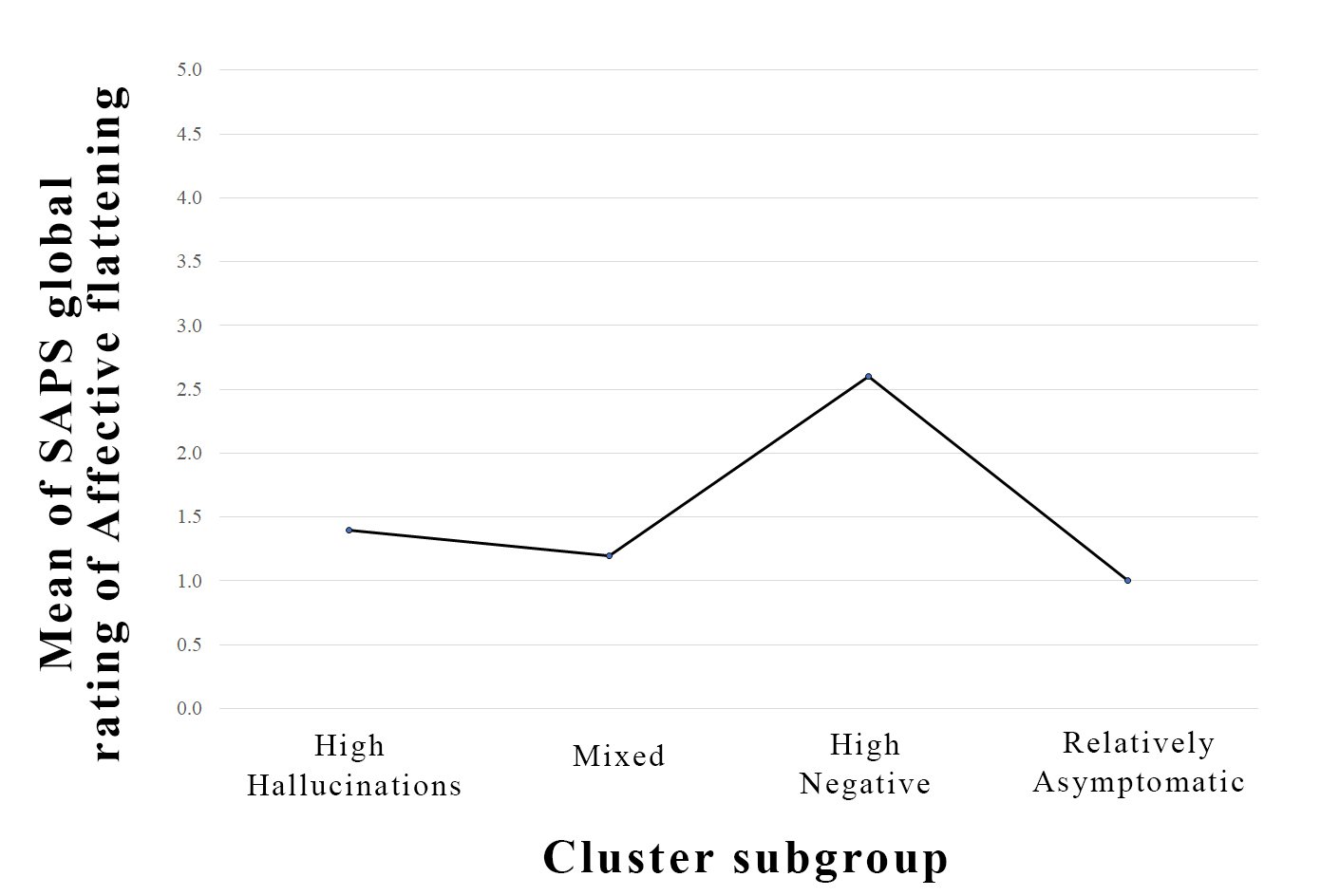
**Figure S4.** Means plot of subgroup SAPS Global rating of hallucinations

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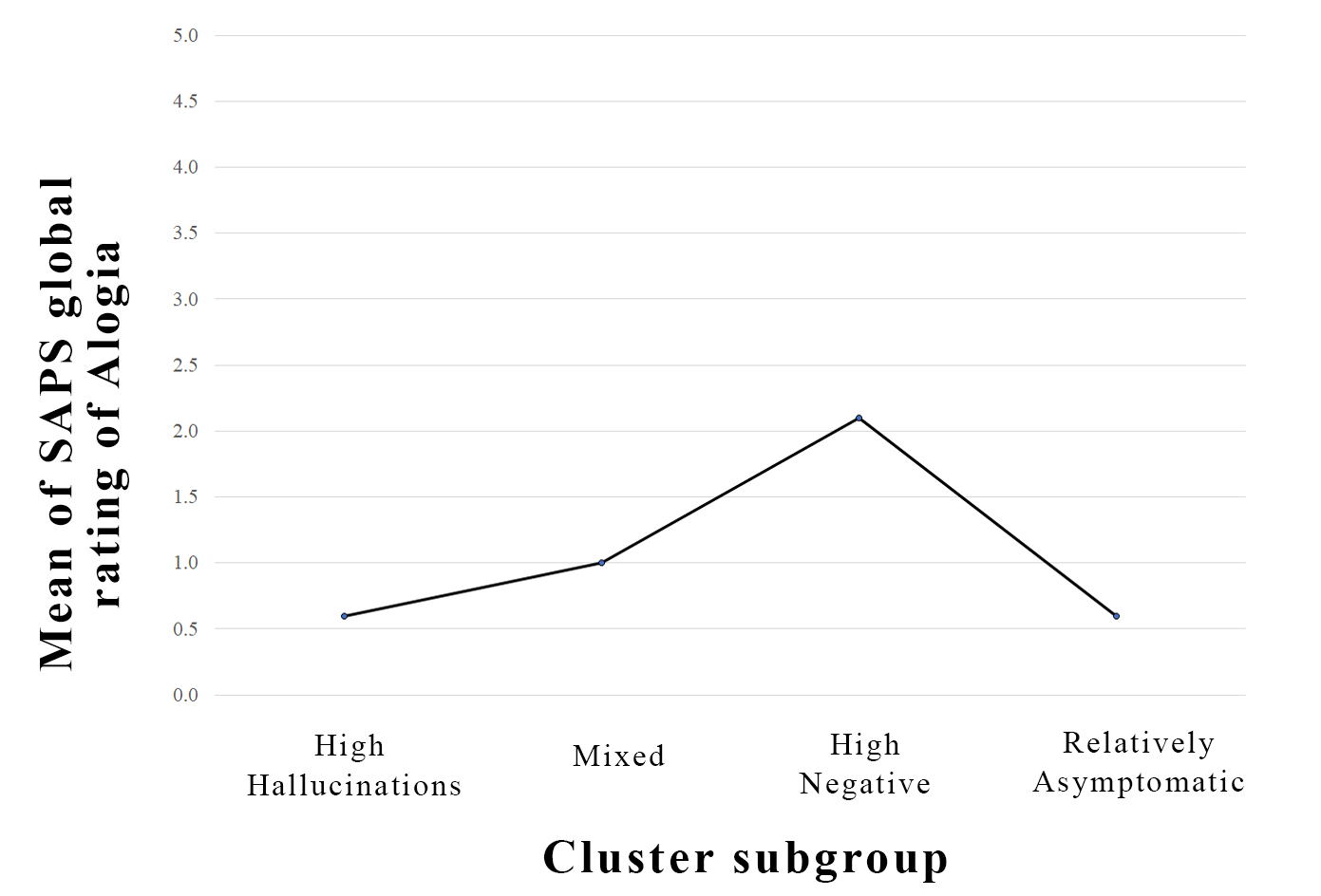
**Figure S5.** Means plot of subgroup SAPS Global rating of delusions

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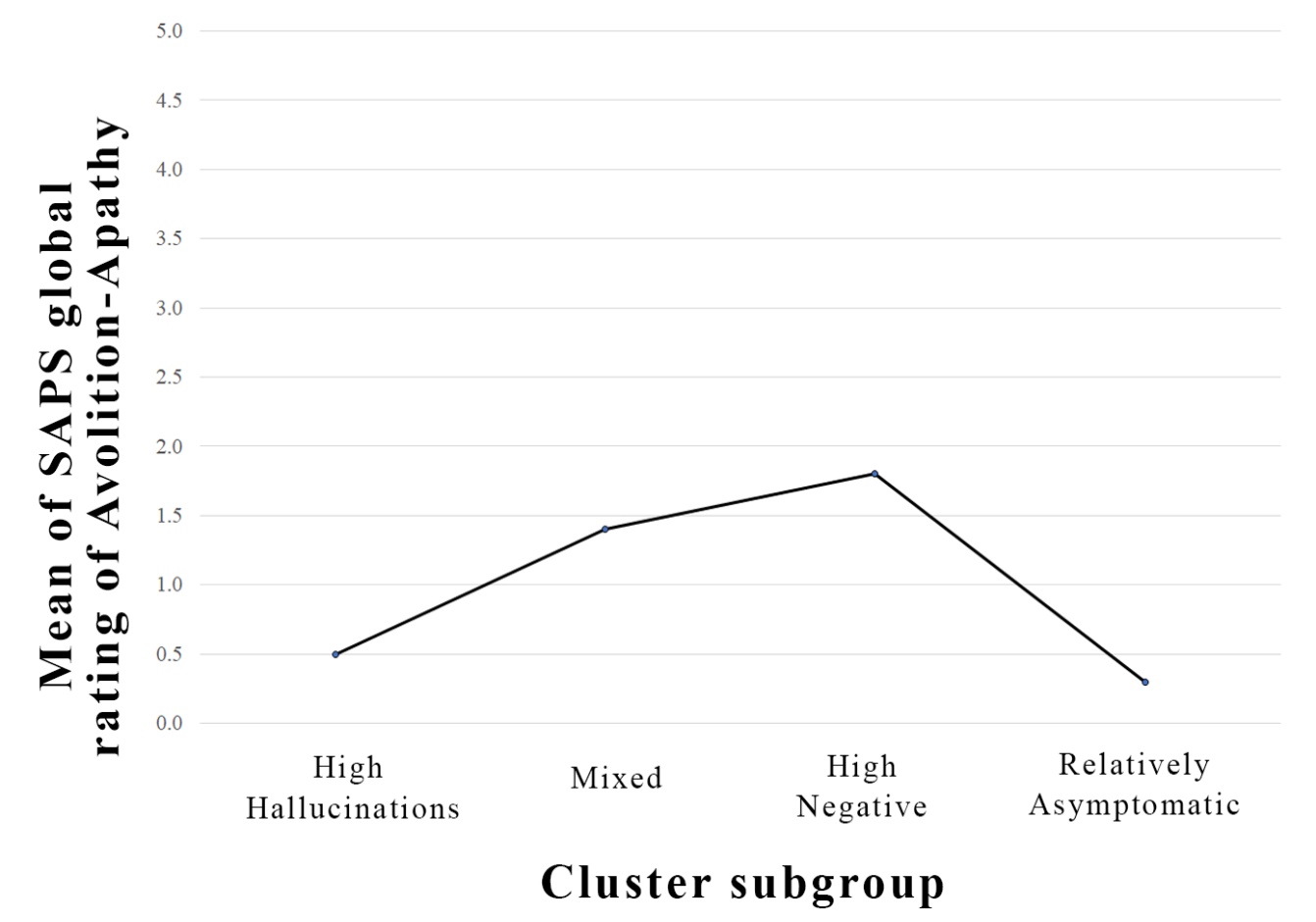
**Figure S6.** Means plot of subgroup SANS Global rating of affective flattening



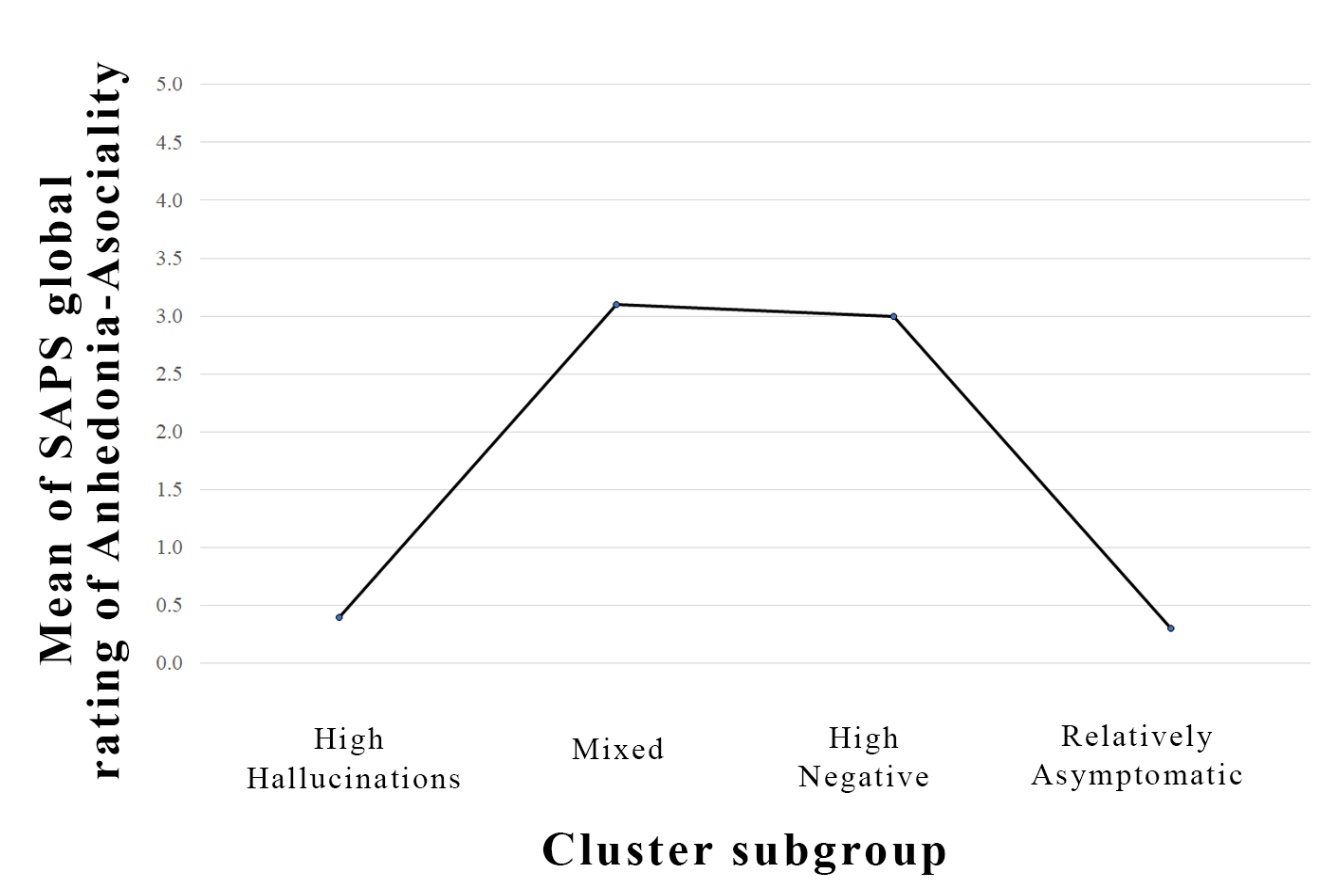
**Figure S7.** Means plot of subgroup SANS Global rating of alogia

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**Figure S8.** Means plot of subgroup SANS Global rating of avolition-apathy

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**Figure S9.** Means plot of subgroup SANS Global rating of anhedonia-asociality

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