

CT1 Psychiatry Selection – Evidence for the use of the MSRA

Overview

Specialty selection processes have needed to change significantly in response to the COVID-19 pandemic. This analysis was conducted to explore the relationship between selection data and in-training performance outcomes, in the context of changes to selection in 2021, as a result of the COVID-19 pandemic. This document focuses on the evidence for the use of the MSRA for selection into CT1 Psychiatry and summarises some of the analysis conducted.

The analysis included data of those who went through the Core Psychiatry selection process between 2015 to 2018, who were offered and accepted a training post, and where access to in-training performance data was available through the UKMED data set.

The MSRA is made up of two tests: the clinical problem solving test (CPS) and the situational judgement test (SJT). The CPS and SJT scores are reported on a scale with a standard deviation of 40 and a mean of 250. MSRA scores were available for about 400 trainees each year from 2015-2018.

The results from the interview consist of a Clinical Interview score and a Portfolio score. These scores range from 10-30 with a mean of around 22 and a standard deviation just above 4.

Since 2018, some applicants to CT1 Psychiatry have been offered an unconditional training programme place based on their MSRA score only, i.e. without needing to attend the selection centre. This has been implemented and continually reviewed based on detailed modelling work and analysis of previous recruitment. The bypass score has applied to all applicants who scored more than 541 on the MSRA; approximately one third of applicants to CT1 Psychiatry achieved this score each recruitment round.

For the purpose of this analysis, scores were banded to review how performance differed between the score bands, e.g., 181-190, 191-200 and so on.

Results

Figure 1, below, shows the average MSRA scores, by ARCP rating. The bars (throughout this report) show the SEM (standard error of the mean). As can be seen, both the CPS and SJT have a strong relationship with ARCP ratings; these differences are highly statistically significant.

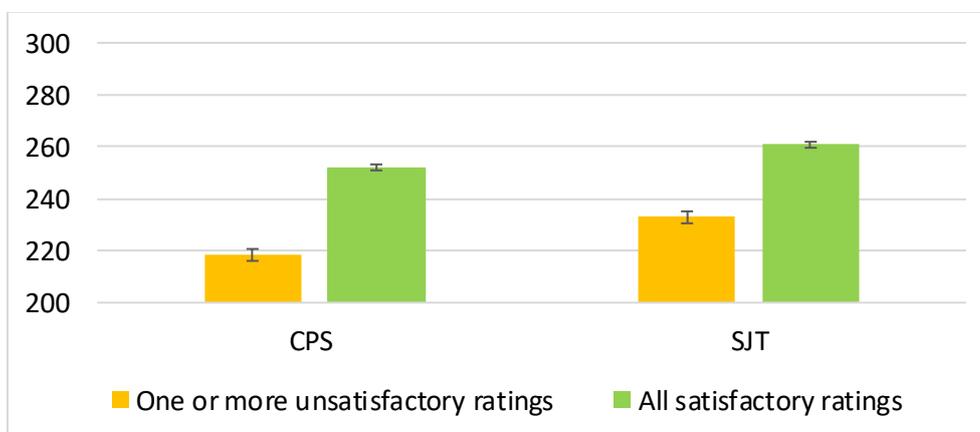


Figure 1. Average MSRA Scores by ARCP Rating

In addition, those in the lowest score bands are considerably more likely to have at least one unsatisfactory rating at ARCP. Around 50% of trainees who scored below 190 on either test received at least one unsatisfactory rating, whereas only around 10% of trainees in the higher score bands did.

Figure 2, below, shows the interview scores by ARCP outcome. For each part of the interview, trainees with no unsatisfactory ratings scored around 1.8 points higher, which is just under half a standard deviation. This is smaller than the difference on MSRA scores but still statistically significant with a sample of nearly 900.

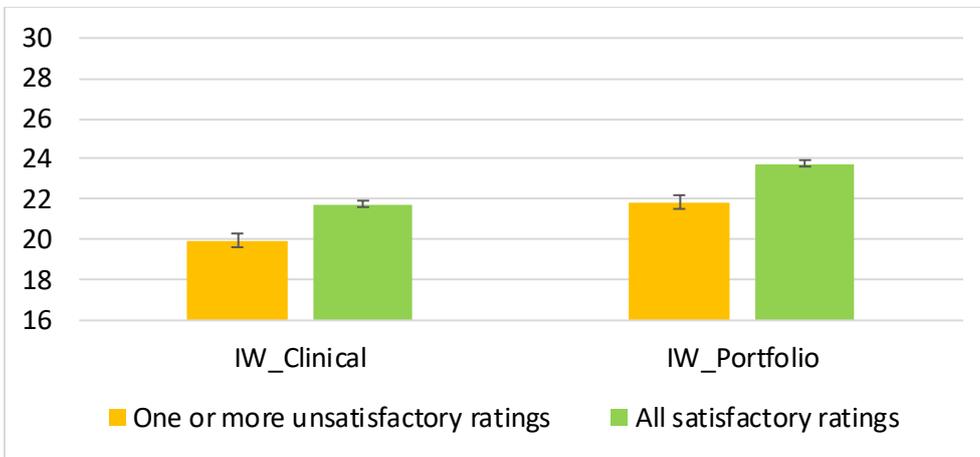


Figure 2. Average Interview Scores by ARCP Rating

Figure 3 shows the mean MSRA scores of those passing or failing the CASC exam first time. Both the CPS and SJT have a strong, statistically significant, relationship with the CASC result.

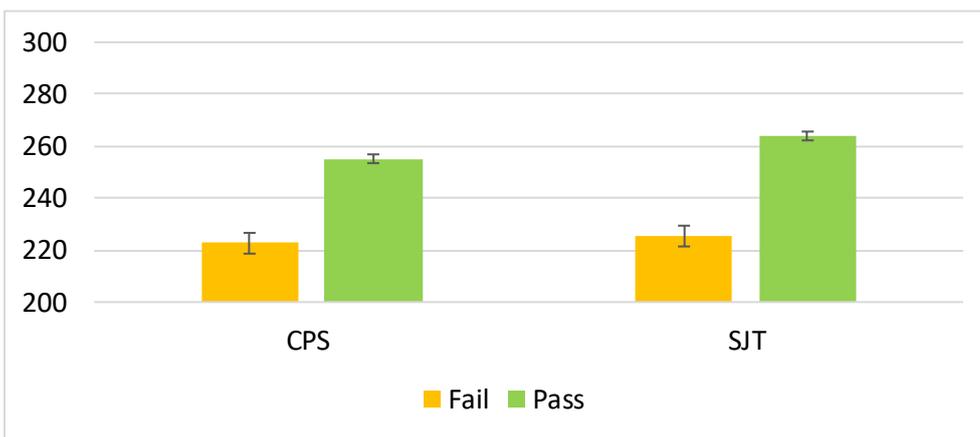


Figure 3. Average MSRA Scores by CASC Result

The MSRA scores are again associated with much higher pass rates for those in high score bands than those in lower score bands; those in lower score bands have an approximately 50% failure rate, whereas those in the higher score bands have around a 7% failure rate.

Figure 4 shows the mean interview scores of those either passing or failing the CASC exam first time. The differences in pass rates between those that score in the higher and lower score bands for the Clinical Interview and Portfolio scores are smaller but still substantial, with more than a third of those in the bottom three bands failing, compared to 5% or less in the top three bands.

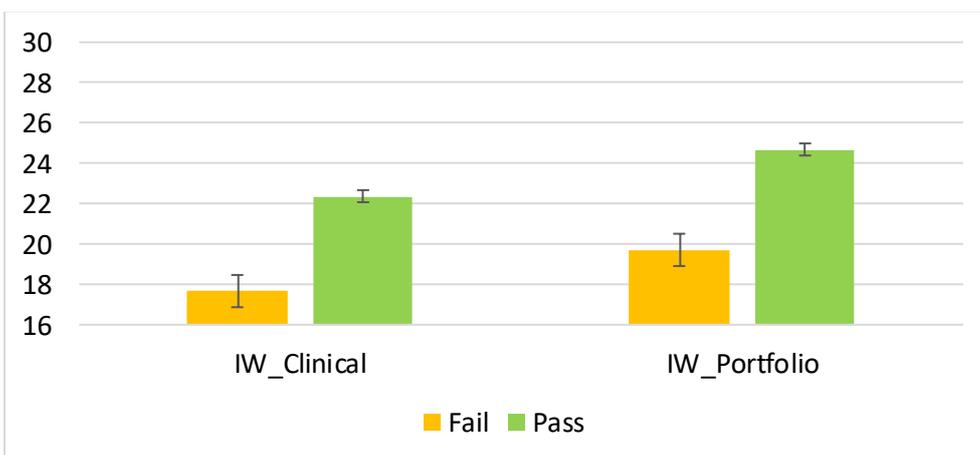


Figure 4. Average Interview Scores by CASC Result

Figure 5 shows the mean MSRA scores of those passing or failing the MRCPsych Paper A first time. The results show that there is a strong relationship between CPS and SJT scores, and the MRCPsych Paper A result, which is highly statistically significant.

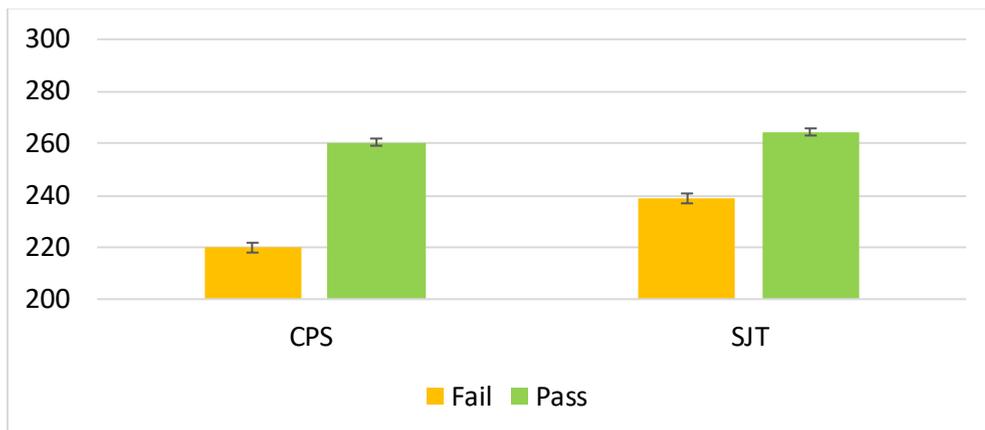


Figure 5. Average MSRA Scores by RCPsych Paper A Result

In terms of score bands, around 80% of those with scores in the lower bands fail Paper A at the first sitting, whereas those who score above average on the CPS and SJT have around a 25% likelihood of failing Paper A first time.

Figure 6 shows the mean MSRA scores of those passing or failing the MRCPsych Paper B first time. Both the CPS and SJT have a strong, statistically significant, relationship with the MRCPsych Paper B result.

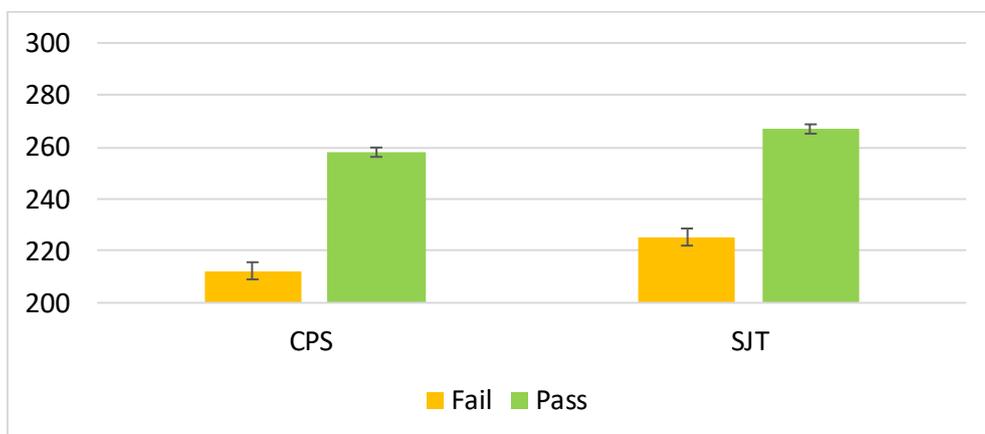


Figure 6. Average MSRA Scores by RCPsych Paper B Result

Around 80% of those with scores in the lower bands fail Paper B at the first sitting, whereas those who score above average on the CPS and SJT have around a 10% likelihood of failing Paper B first time.

Figures 7 and 8 show the mean interview scores of those either passing or failing the RCPsych exams first time. Exam scores on Paper A and Paper B have a lower correlation with the mean interview scores and there is less difference between pass rates for high and low scores. There were 761 trainees with interview scores who had attempted Paper A and 479 who attempted Paper B. The overall pass rate for Paper A at first sitting for these trainees was 64%, and 79% for Paper B.

Those with a Clinical Interview or Portfolio score below 20 have more than a 50% failure rate for Paper A. For Paper B, the failure rate for those scoring below 20 was 32% for the Clinical Interview and 47% for the Portfolio score. In comparison, those with a Clinical Interview or Portfolio score of 26 or over have around a 25% failure rate on Paper A and 15% on Paper B.

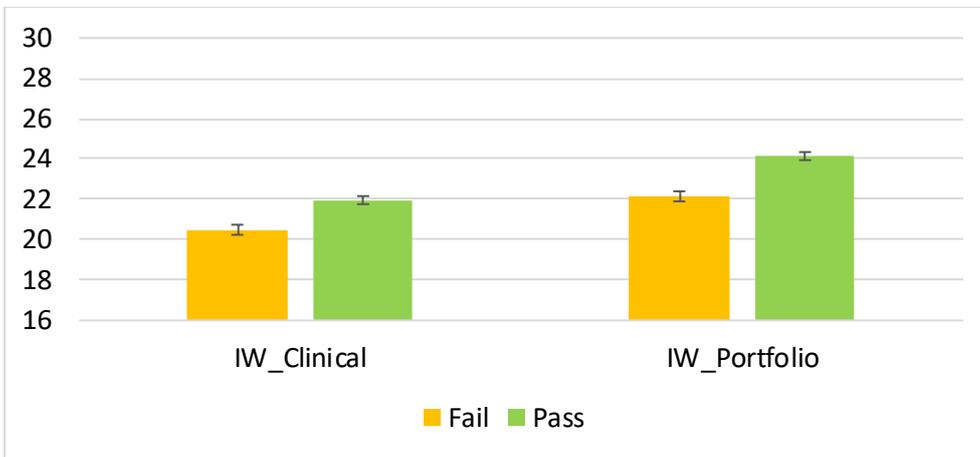


Figure 7. Average Interview Scores by RCPsych Paper A Result

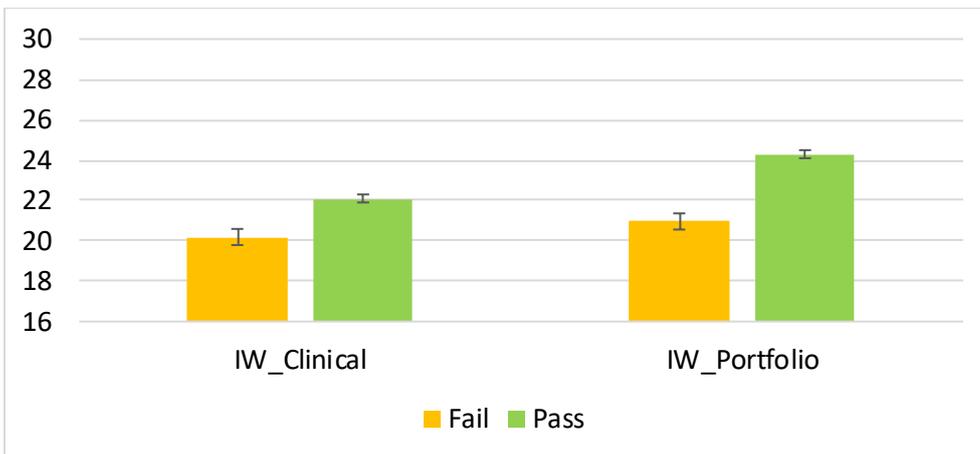


Figure 8. Average Interview Scores by RCPsych Paper B Result

Summary

These results confirm the value of the MSRA as a method for identifying those who will progress through Core Psychiatry training. Both the CPS and SJT have strong relationships with ARCP ratings and MRCPsych exam results; poor performance on either the CPS or SJT is strongly associated with lower success rates in-training. The CPS and SJT have been shown to be more powerful predictors than the interviews, although the Portfolio scores do show some predictive power. The Clinical Interview is most predictive of the CASC scores, which is the assessment most likely to capture practical skills, rather than theoretical and procedural knowledge.

This provides support for the increased weighting of the MSRA in Core Psychiatry selection in the current context of the COVID-19 pandemic, and for the use of the MSRA as a selection tool to identify trainees most likely to achieve core training with the least educational adversity.