

List of Variables

Data from all three time points can be found in the SPSS file *T1_T2_T3_Data_for_upload.sav* – please see Tables 1 and 2 for the type of data available for each task in this file (Table 1 for group tasks and Table 2 for individually administered tasks).

Furthermore, item level data is available for a number of the tasks administered. Transcoding data for Time 1 and 2 can be found in the Excel spreadsheet *T1_T2_Transcoding.xlsx* – please see Table 3 for the type of data available in this file. Data for the math outcome measures at Time 3 is available separately in *T3_Math_outcome_measures.xlsx* and information on the item-level data available can be found in Table 4.

Time 2 and 3 Number Matching as well as adult Number Matching data can be found in the Excel spreadsheet *Number_Matching.xlsx*. Single digit matching data collected at Time 3 can be found in *T3_SingleDigitMatching.xlsx*.

Table 1: Group administered tasks, data available in SPSS file T1_T2_T3_Data_for_upload. The number shown in brackets after each task is the variable number at which each task starts in the SPSS file variable view.

Time 1 (Spring 2017)	Time 2 (Spring 2018)	Time 3 (Spring 2019)
<u>Magnitude comparison (14)</u> - Total Correct, Total Incorrect, Total Multiple, Total Omissions for each Exercise (&Practice)	<u>Magnitude comparison (104)</u> - Total Correct, Total Incorrect, Total Multiple, Total Omissions for each Exercise (&Practice)	<u>Magnitude comparison (189)</u> - Total Correct, Total Incorrect, Total Multiple, Total Omissions for each Exercise (&Practice)
<u>Number writing (50)</u> - N correct total, N error total	<u>Number writing (144)</u> - N correct total, N error total	
<u>Numerical Operations (52)</u> - Total score - Total CORE score	<u>Numerical Operations (146)</u> - Total score - Total CORE score	<u>Numerical operations (225)</u> - Total score (=core score)
<u>One-minute addition</u> <u>One-minute subtraction (54)</u> - Total correct for each subtest	<u>One-minute addition</u> <u>One-minute addition extra-task</u> <u>One-minute subtraction</u> <u>One-minute subtraction extra-task (148)</u> - Total correct for each subtest	<u>One-minute addition</u> <u>One-minute addition extra-task</u> <u>One-minute subtraction</u> <u>One-minute subtraction extra-task (226)</u> - Total correct for each subtest

		<u>One-minute multiplication (230)</u> <u>One-minute division</u> - Total correct for each subtest
<u>Raven's Matrices (56)</u> - Total raw score		
<u>Number identification (57)</u> - Total correct	<u>Number identification (152)</u> - Total correct	
<u>Ordinality digits (58)</u> - Total practice score, total correct response, total omission, total incorrect response, total multiple response, total complete no omission, total complete, proportion correct	<u>Ordinality dots & Ordinality digits (153)</u> - Total practice, total correct, total omissions, total incorrect, total multiple responses, total processed items, proportion correct	<u>Ordinality dots & Ordinality digits (232)</u> - Total practice, total correct, total omissions, total incorrect, total multiple responses, total processed items, proportion correct
<u>Single Digit Writing (65)</u> Total correct, total incorrect, total mirror correct, total mirror incorrect, total omission	<u>Single Digit Writing (167)</u> - Total correct, total incorrect, total mirror correct, total mirror incorrect, total omission	
		<u>Fraction writing (246)</u> - Total score
		<u>Maths reasoning (247)</u> - Total score
		<u>Conversion task (248)</u> - Total score for the entire task
		<u>Three digit and Fraction number line (249)</u> - Total true percentage accuracy error, total converted percentage accuracy error, total percentage accuracy

Table 2: Individually administered tasks – data available in SPSS file T1_T2_T3_Data_for_upload. The number shown in brackets after each task is the variable number at which each task starts in the SPSS file variable view.

Time 1 (Spring 2017)	Time 2 (Spring 2018)	Time 3 (Spring 2019)
<u>Digit span forward & Digit span backward (70)</u> - Forward & backward span & total correct		
<u>RAN letters & RAN digits (74)</u> - RAN Letter Total Time and RAN Digit Total Time		
<u>Number reading (76)</u> - Total score, total errors, total omissions, number of items not administered	<u>Number reading (172)</u> - Total score, total errors, total omissions, number of items not administered	
<u>Corsi blocks forward & Corsi blocks backward (80)</u> - Forward & backward span & total correct		
<u>Timed counting (84)</u> - Max Correct, Time taken correct, numbers per second		
<u>Phonological awareness (87)</u> - Phoneme deletion raw total score		
<u>Word and pseudoword reading (88)</u> - SWE & PDE Raw scores	<u>Word and pseudoword reading (176)</u> - SWE & PDE Raw scores	<u>Word and pseudoword reading (255)</u> - SWE & PDE Raw scores
	<u>Go / No-Go task (178)</u> - Go No Go Expected N Part 2 Go, Go No Go Expected N Part 2 NoGo, Go No Go Accuracy Part 2 Go, Go No Go Accuracy	

	Part 2 NoGo, Go No Go Expected N Part 1 Go only, Go No Go Median RT Part 1 Go only, Go No Go Median RT Part 2 Go only	
		<u>Conceptual understanding task (257)</u> <ul style="list-style-type: none">- Computer task accuracy & reaction time for each type, total accuracy- Percentage correct for each type, total percentage correct

Table 3: Transcoding data gathered at Time 1 and Time 2, available in Excel Spreadsheet T1_T2_Transcoding.

Time 1 (Spring 2017)	Time 2 (Spring 2018)
<u>Number writing</u> <ul style="list-style-type: none"> - Item level with errors - N mirrored correct total, count mirror for each digit, total count mirror - N correct for: X, Teens, X0, XX, X00, XX0, X0X, XXX, X000, XX00, XXX0, XXXX, X0XX, X00X, XX0X, X0X0 - N single digit correct, two digit correct, three digit correct, four digit correct. 	<u>Number writing</u> <ul style="list-style-type: none"> - Item level with errors - N correct for: Teens, X0, XX, X00, XX0, X0X, XXX, XTeen, X000, XX00, XXX0, XXXX, XXTeen, X0XX, X00X, XX0X, X0X0 - N single digit correct, two digit correct, three digit correct, four digit correct.
<u>Number identification</u> <ul style="list-style-type: none"> - Item level data (a-h) 	<u>Number identification</u> <ul style="list-style-type: none"> - Item level data (a-u)
<u>Single digit writing</u> <ul style="list-style-type: none"> - Item level responses - Per digit: correct, incorrect, mirror correct, mirror incorrect, omission (out of 3) 	<u>Single digit writing</u> <ul style="list-style-type: none"> - Item level responses - Per digit: correct, incorrect, mirror correct, mirror incorrect, omission (out of 3)
<u>Number reading</u> <ul style="list-style-type: none"> - Item level with errors - Totals for X, Teens, X0, XX, X00, XX0, X0X, XXX, X000, XX00, XXX0, XXXX, X0XX, X00X, X0X0 - Total single digit correct, total two digit correct, total three digit correct, total four digit correct 	<u>Number reading</u> <ul style="list-style-type: none"> - Item level with errors - Totals for Teens, X0, XX, X00, XX0, X0X, XXX, XTeen, X000, XX00, XXX0, XXXX, X0XX, X00X, X0X0, X0Teen, XXTeen - Total two digit correct, total three digit correct, total four digit correct, total five digit correct

Table 4: Math outcome measures at Time 3, available in Excel Spreadsheet T3_Math_outcome_measures.

Time 3 (Spring 2019)
<u>Fraction writing</u> <ul style="list-style-type: none"> - Item level data – answer and score
<u>Maths reasoning</u> <ul style="list-style-type: none"> - Item level answer and score
<u>Conversion task</u> <ul style="list-style-type: none"> - Item level answer and score - Total scores for money, time, length
<u>Number line task</u> <ul style="list-style-type: none"> - For each item: placing in mm, percentage placing, true percentage accuracy error, converted percentage accuracy error, percentage accuracy
<u>Conceptual understanding task</u> <ul style="list-style-type: none"> - Explanation items 1 and 2 response & correct/incorrect for each type - Total score explanation identical, unrelated, subcomp, commutativity, inverse, total explanation score - Raw data