Exhibit 13.3: TIMSS 2015 Mathematics Items for Concurrent Calibration at the Eighth Grade

| Item Type | Points | Items <br> Released <br> in 2011 |  | Items Common in 2011 and 2015 |  | Items Introduced in 2015 |  | Total |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Items | Points | Items | Points | Items | Points | Items | Points |
| Multiple-Choice | 1 | 48 | 48 | 70 | 70 | 41 | 41 | 159 | 159 |
| Constructed Response | 1 | 30 | 30 | 52 | 52 | 34 | 34 | 116 | 116 |
|  | 2 | 10 | 20 | 5 | 10 | 7 | 14 | 22 | 44 |
| Total |  | 88 | 98 | 127 | 132 | 82 | 89 | 297 | 319 |

TIMSS 2015 Eighth Grade Mathematics Items for Concurrent Calibration by
Content and Cognitive Domains

| Mathematics Content Domains | Items Released in 2011 |  | Items Common in 2011 and 2015 |  | Items Introduced in 2015 |  | Total |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Items | Points | Items | Points | Items | Points | Items | Points |
| Number | 20 | 21 | 40 | 44 | 24 | 25 | 84 | 90 |
| Algebra | 30 | 35 | 40 | 41 | 21 | 22 | 91 | 98 |
| Geometry | 20 | 22 | 22 | 22 | 21 | 25 | 63 | 69 |
| Data and Chance | 18 | 20 | 25 | 25 | 16 | 17 | 59 | 62 |
| Mathematics Cognitive Domains | Items Released in 2011 |  | Items Common in 2011 and 2015 |  | Items Introduced in 2015 |  | Total |  |
|  | Items | Points | Items | Points | Items | Points | Items | Points |
| Knowing | 34 | 36 | 45 | 45 | 24 | 24 | 103 | 105 |
| Applying | 30 | 34 | 54 | 57 | 40 | 44 | 124 | 135 |
| Reasoning | 24 | 28 | 28 | 30 | 18 | 21 | 70 | 79 |
| Total | 88 | 98 | 127 | 132 | 82 | 89 | 297 | 319 |

