

## **Creating a World-Class Education System: Examination Attainment 2016**

### **Report by Dr Grace Vickers, Head of Education**

#### **1 Purpose of Report**

Further to the National Improvement Framework report which was presented to Council on 3 November 2015 and the May 2016 Council Report on the national benchmarking attainment measures, the purpose of this report is to provide an overview of secondary school examination attainment in session 2015-16 using the senior phase local benchmarking attainment measures, called 'Insight'.

#### **2 Background**

In session 2013-14, the new senior phase benchmarking attainment measures, called 'Insight', were implemented replacing the former Standard tables and charts (STACS). The new measures provide a broader and deeper picture of how young people are progressing in our secondary schools and includes a wide range of new qualifications including vocational and wider achievement awards.

The new measure also provides important data on the performance of young people in different contexts in order to help focus our improvement targets towards closing the attainment gap. The new measures report on the performance and progress of two main cohorts of students: the National Benchmarking measures report on the progress and performance of the summer leavers cohort from S4, S5 and S6 and the Local Benchmarking measures report on the progress and performance of the students who have continued their education in S4, S5 and S6. There are four Benchmarking Measures used to report on the progress and performance of students: Improving Attainment in Literacy and Numeracy; Increasing Post-School Participation; Improving Attainment for All; and Attainment versus Deprivation. To compliment the data provided by these Benchmarking Measures, Insight also provides Breadth and Depth Course measures which are used to provide data on the percentage of pupils gaining awards at specific levels by the end of each year stage. This data, when used in conjunction with the Benchmarking Measures, provides a richer picture of the progress and performance of Midlothian students.

## 2.1 Improving Attainment in Literacy and Numeracy

### 2.1.1 The percentage of pupils attaining literacy and numeracy at SCQF level 4 and SCQF level 5 by the end of S4:

Level 4: S4 stage	2014	2015	2016
Midlothian	81.66	81.38	84.34
Virtual Comparator	80.31	84.51	83.91
National	77.38	82.63	83.08
Level 5: S4 stage			
Midlothian	33.87	36.72	52.92
Virtual Comparator	41.5	45.48	48.71
National	37.64	43.51	47.57

*Table 1: Improving attainment in literacy and numeracy outcomes for S4  
(Source: Insight September 2016)*

Table 1 shows an improving pattern in literacy and numeracy at levels 4 and 5:

- Attainment in level 4 Literacy and Numeracy shows an improvement of 2.96% when compared with last year. Attainment is now above both the virtual comparator and national levels.
- Attainment in level 5 Literacy and Numeracy shows an improvement of 16.2% when compared with the previous year. Attainment is now above the virtual comparator and the national average.

Next steps for improvement: To continue to ensure that literacy and numeracy at levels 4 and 5 remain above the virtual comparator and national average.

### 2.1.2 The percentage of pupils attaining literacy and numeracy at SCQF level 4 and SCQF level 5 by the end of S5:

Level 4: S5 stage	2014	2015	2016
Midlothian	84.28	91.26	90.35
Virtual Comparator	84.18	90.1	92.38
National	84.62	89.65	91.83
Level 5: S5 stage			
Midlothian	53.44	66.32	62.59
Virtual Comparator	57.6	65.83	69.6
National	57.04	64.92	68.2

*Table 2: Improving attainment in literacy and numeracy outcomes for S5  
(Source: Insight September 2016)*

Table 2 shows a one year dip in literacy and numeracy at levels 4 and 5 by the end of S5:

- Attainment in level 4 Literacy and Numeracy shows a one year decline of 0.91% when compared with last year. Attainment for literacy and numeracy by the end of S5 in 2016 is below both the virtual comparator and national levels.
- Attainment in level 5 Literacy and Numeracy shows a one year decline of 3.73%. Attainment in 2016 for literacy and numeracy by the end of S5 is below the virtual comparator and the national average.

Next steps for improvement: To focus on improving outcomes at level 4 and 5 literacy and numeracy by the end of S5 in order to bring in line with the virtual comparator and national average.

### 2.1.3 The percentage of pupils attaining literacy and numeracy at SCQF level 4 and SCQF level 5 by the end of S6:

Level 4: S6 stage	2014	2015	2016
Midlothian	71.47	76.92	85.03
Virtual Comparator	80.92	82.88	88.17
National	76.41	78.58	84.76
Level 5: S6 stage			
Midlothian	46.05	50.56	60.45
Virtual Comparator	55.98	58.65	64.93
National	51.33	53.57	61.21

*Table 3: Improving attainment in literacy and numeracy outcomes for S6  
(Source: Insight September 2016)*

Table 3 shows a significant improvement in literacy and numeracy by the end of S6:

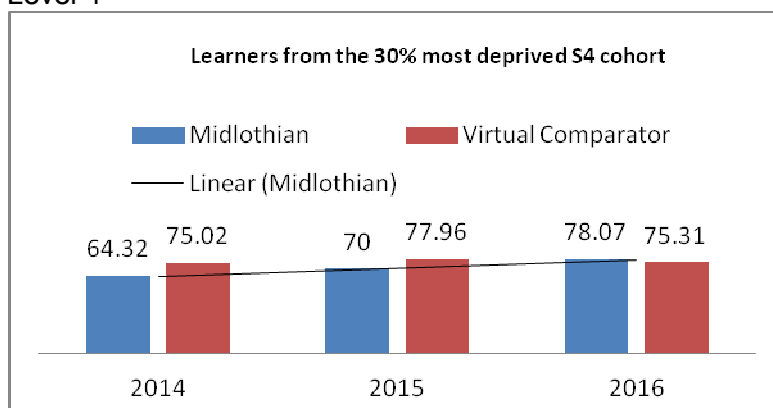
- Attainment in level 4 Literacy and Numeracy shows an 8.11% improvement when compared with the previous year. Attainment for literacy and numeracy by the end of S6 in 2016 is above the national average but below the virtual comparator.
- Attainment in level 5 Literacy and Numeracy shows a 9.89% improvement when compared with the previous year. Attainment in 2016 for literacy and numeracy by the end of S6 is below the virtual comparator and the national average.

Next steps for improvement: To focus on improving outcomes at level 4 and 5 literacy and numeracy by the end of S6 in order to bring in line with the virtual comparator at level 4 and to bring in line with the virtual comparator and national average for level 5.

### 2.1.4 How do we know if we are closing the poverty related attainment gap in Literacy and Numeracy?

This following measures show how the 30% most deprived learners by the end of S4 are progressing compared to the virtual comparator in literacy and numeracy.

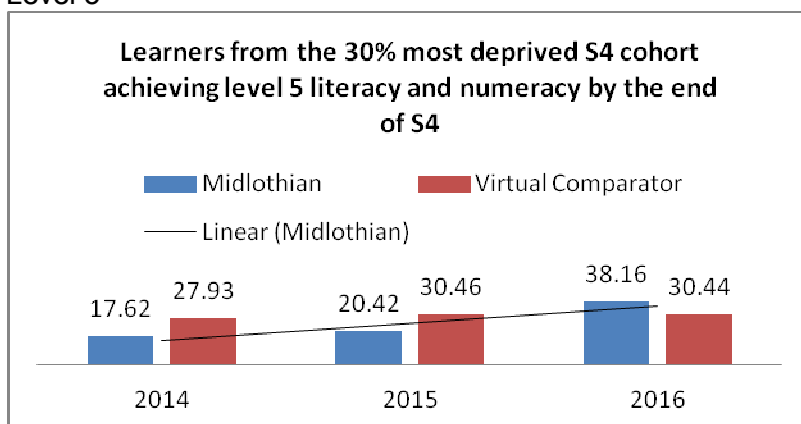
#### Level 4



*Figure 1: Literacy and Numeracy Outcomes by the end of S4 for the 30% most deprived learners at Level 4*

Figure 1 shows a three year improvement trend for Literacy and Numeracy at level 4 for the 30% most deprived learners by the end of S4. Attainment in 2016 is now above both the virtual and the national average. Attainment at this level in 2016 is 8.07% higher than the previous year.

## Level 5



*Figure 2: Literacy and Numeracy Outcomes by the end of S4 for the 30% most deprived learners at Level 5.*

Figure 2 shows a three year improvement trend for Literacy and Numeracy at level 5 for the 30% most deprived learners by the end of S4. Attainment in 2016 is now above both the virtual and the national average with attainment at level 5 in 2016 being more than double the percentage achieved in 2014.

## 2.2 Improving Attainment for All:

### 2.2.1 The average total tariff score of pupils based on the attainment of the lowest 20%, middle 60% and highest 20% by the end of S4:

S4	Lowest 20%	Middle 60%	Highest 20%
Midlothian	122	377	555
Virtual Comparator	119	379	600
National	114	372	592

*Table 4: Improving Attainment for All by the end of S4  
(Source: Insight September 2016)*

Table 4 relates to the total tariff points gained in Midlothian by the lowest performing 20%, the middle performing 60% and the highest performing 20%. Each qualification attained by pupils is allocated a tariff score by the Scottish Qualifications Authority (SQA). The highest performing 20% of students attain higher tariff scores as they tend to stay on to S6, completing more courses, and passing courses at higher levels.

Table 4 shows the following for Midlothian by the end of S4:

- Total tariff scores for the lowest performing 20% by the end of S4 is above both the virtual comparator and the national average.
- Total tariff scores for the middle performing 60% by the end of S4 is above the national average but below the virtual comparator by 2 tariff points.
- Total tariff scores for the highest performing 20% by the end of S4 is below the virtual comparator and the national average.

Next steps for Improvement: Using this new data, we aim to focus on closing the gap which has emerged for each cohort with a particular emphasis on the middle 60% to bring in line with the virtual comparator and the highest performing 20% which show the largest gap between the virtual and the national comparator data.

## 2.2.2 The average total tariff score of pupils based on the attainment of the lowest 20%, middle 60% and highest 20% by the end of S5:

S5	Lowest 20%	Middle 60%	Highest 20%
Midlothian	126	571	1135
Virtual Comparator	171	670	1172
National	149	640	1169

*Table 5: Improving Attainment for All by the end of S5  
(Source: Insight September 2016)*

Table 5 shows the following for Midlothian by the end of S5:

- Total tariff scores for the lowest performing 20% by the end of S5 is below both the virtual comparator and the national average.
- Total tariff scores for the middle performing 60% by the end of S5 is below the virtual comparator and the national average.
- Total tariff scores for the highest performing 20% by the end of S5 is below the virtual comparator and the national average.

Next steps for Improvement: Using this new data, we aim to focus on closing the gap which has emerged for each cohort with a particular emphasis on the lowest 20%, middle 60% and highest 20% in order to bring in line with the virtual comparator and the national comparator data by the end of S5.

## 2.2.3 The average total tariff score of pupils based on the attainment of the lowest 20%, middle 60% and highest 20% by the end of S6:

S6	Lowest 20%	Middle 60%	Highest 20%
Midlothian	438	1191	2031
Virtual Comparator	510	1205	1967
National	476	1174	1943

*Table 6: Improving Attainment for All by the end of S6  
(Source: Insight September 2016)*

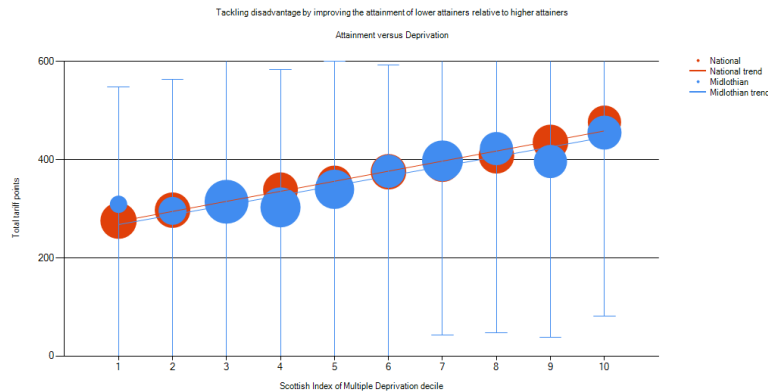
Table 6 shows the following for Midlothian by the end of S6:

- Total tariff scores for the lowest performing 20% by the end of S6 is below the national average and the virtual comparator.
- Total tariff scores for the middle performing 60% by the end of S6 is above the national average but below the virtual comparator.
- Total tariff scores for the highest performing 20% by the end of S6 is above the virtual comparator and the national average.

Next steps for Improvement: To bring in line with the virtual comparator for the lowest 20% and the middle 60% by the end of S6.

## 2.3 Attainment versus deprivation: tackling disadvantaged by improving the attainment of lower attaining pupils relative to higher attaining pupils based on the average total tariff score of pupils, by decile, using the Scottish Index of Multiple Deprivation (SIMD).

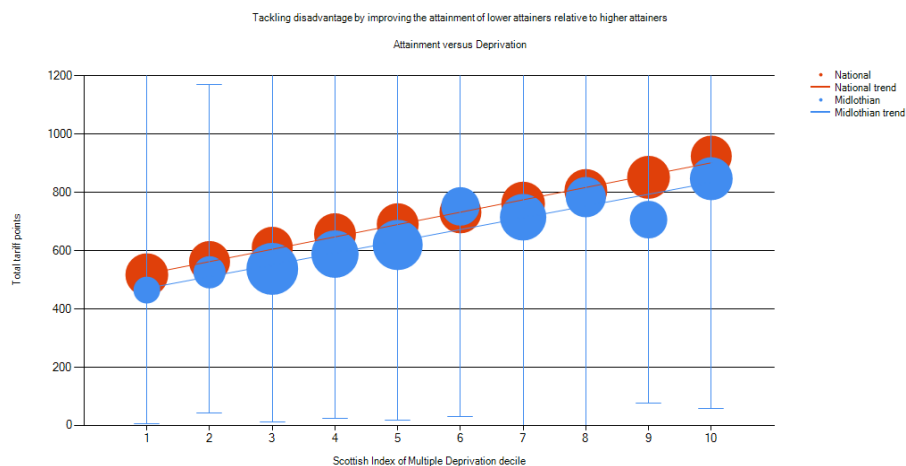
### 2.3.1 Attainment versus Deprivation by the end of S4:



*Figure 3: Attainment versus Deprivation by the end of S4  
(Source: Insight September 2016)*

Figure 3 presents the data for attainment versus deprivation by the end of S4. The discs represent the relative performance of Midlothian school leavers in each SIMD decile compared to the virtual comparator group. The size of the disc gives a visual indication of the number of students in each decile. The gradient of the line indicates the relative level of attainment versus deprivation for Midlothian school leavers. In 2015/16, decile 4 and 9 is lower than national establishment.

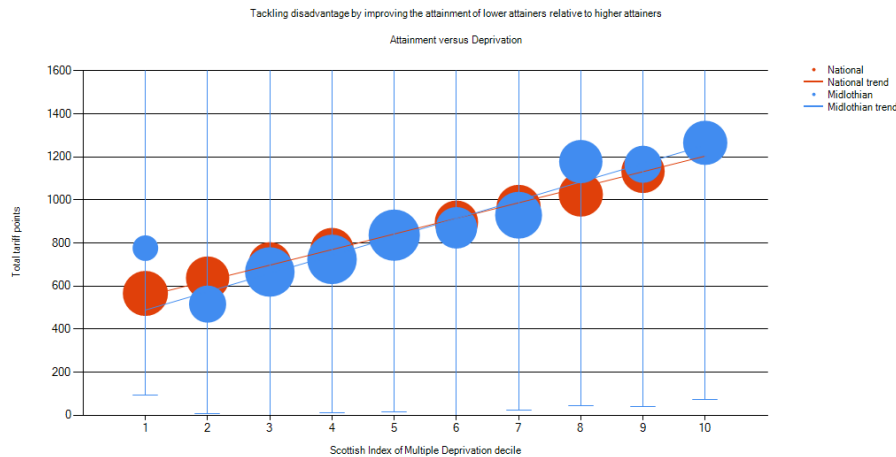
### 2.3.2 Attainment versus deprivation by the end of S5:



*Figure 4: Attainment Versus Deprivation by the end of S5  
(Source: Insight September 2016)*

Figure 4 presents the data for attainment versus deprivation by the end of S5. In 2015/16, decile 9 is much lower than the national establishment. In deciles 1, 3, 4, 5 and 7 performance is lower than the national establishment.

### 2.3.3 Attainment versus Deprivation by the end of S6:



*Figure 5: Attainment Versus Deprivation by the end of S6  
(Source: Insight September 2016)*

Figure 5 presents the data for attainment versus deprivation by the end of S6. In 2015/16, decile 1 is much greater than the national establishment. Decile 2 is much lower than the national establishment and decile 8 is greater than the national establishment.

Next steps for improvement:

- To further improve attainment in deciles 4 and 9 by the end of S4.
- To further improve attainment in deciles 1, 3, 4, 5, 7 and 9 by the end of S5.
- To further improve attainment in decile 2 by the end of S6.
- To continue to share best practice across the six Secondary Schools in order to ensure robust tracking and monitoring arrangements are in place to both support and challenge further improvements in attainment and to continue to close the attainment related poverty gap.

### 2.4 Breadth and Depth Measures:

To compliment the data provided by the Benchmarking Measures, Insight also provides course measures. In this report the Breadth and Depth Course measure is used to provide data on the percentage of pupils gaining awards at specific levels by the end of each year stage. This data, when used in conjunction with Benchmarking Measures, provides a richer picture of the progress and performance of Midlothian students.

The Breadth and Depth measures provided in this report are similar to the traditional attainment measures as follows: percentage of pupils attaining five or more awards at SCQF level 3, level 4 and level 5 or better by the end of S4; percentage of pupils attaining one, three or five awards or more at SCQF level 6 or better by the end of S5; percentage of pupils attaining one, three or five or more awards at SCQF level 6 or better by the end of S6; and one or more awards at SCQF level 7 by the end of S6.

### 2.4.1 Breadth and Depth Measures

Attainment by the end of S4			Level 3	Level 4	Level 5
5 or more	Midlothian	2012	90.30%	77.10%	32.00%
		2013	90.30%	79.00%	32.40%
		2014	90.60%	83.40%	40.30%
		2015	88.10%	83.60%	38.30%
		2016	90.40%	83.00%	44.30%
		3 yr avg	89.70%	82.00%	37.00%
		4 yr trend	0.00%	1.50%	3.10%
5 or more	Virtual Comparator	2012	91.00%	79.50%	35.60%
		2013	91.20%	80.80%	38.70%
		2014	85.80%	80.90%	42.30%
		2015	84.40%	79.50%	44.50%
		2016	83.60%	78.90%	46.20%
		3 yr avg	84.60%	79.80%	44.30%
		4 yr trend	-1.90%	-0.20%	2.60%

*Table 7: Breadth and Depth measures by the end of S4  
(Source: Insight September 2016)*

Table 7 shows a positive three year average for levels 3 and 4 by the end of S4 when compared to the virtual comparator. In 2016, there was a 6% improvement in five or more qualifications at level 5 by the end of S4 but despite this significant improvement in attainment this indicator still remains below the virtual comparator.

Next steps for improvement: To further improve attainment at level 5 by the end of S4.

### 2.4.2 Breadth and Depth Measures by the end of S5:

Level 6 qualifications		Midlothian	Virtual Comparator
1 or more	2012	44.10%	50.90%
	2013	45.50%	52.40%
	2014	48.50%	56.90%
	2015	55.30%	61.10%
	2016	51.30%	62.00%
	3 yr avg	51.70%	60.00%
	4 yr	1.80%	2.80%
3 or more	2012	23.80%	31.20%
	2013	26.60%	31.60%
	2014	26.10%	36.40%
	2015	34.20%	40.60%
	2016	30.80%	41.10%
	3 yr avg	30.30%	39.40%
	4 yr	1.70%	2.50%
5 or more	2012	8.80%	13.60%
	2013	10.10%	13.60%
	2014	12.10%	18.40%
	2015	17.00%	20.30%
	2016	12.30%	19.10%
	3 yr avg	13.80%	19.30%
	4 yr	0.90%	1.40%

*Table 8: Breadth and Depth Measures by the end of S5 stage (Source: Insight September 2016)*



Table 8 shows a positive 4 year trend for all measures. However the virtual comparator is improving at a faster rate.

Next steps for improvement: To focus on attainment by the end of S5 in order to bring in line with the virtual comparator.

### 2.4.3 Breadth and Depth Measures by the end of S6:

Level 6 qualifications			Midlothian	Virtual comparator
1 or more	Midlothian	2012	49.70%	55.30%
		2013	52.90%	58.20%
		2014	50.70%	60.90%
		2015	55.10%	63.60%
		2016	60.30%	66.10%
		3 yr avg	55.40%	63.50%
		4 yr trend	2.60%	2.70%
3 or more	Midlothian	2012	32.50%	40.40%
		2013	35.90%	43.40%
		2014	36.30%	45.60%
		2015	40.20%	48.30%
		2016	43.90%	50.70%
		3 yr avg	40.10%	48.20%
		4 yr trend	2.90%	2.60%
5 or more	Midlothian	2012	20.40%	26.80%
		2013	21.40%	30.10%
		2014	26.20%	31.60%
		2015	24.00%	34.10%
		2016	24.00%	36.40%
		3 yr avg	24.70%	34.00%
		4 yr trend	0.90%	2.40%
Level 7 qualifications			Midlothian	Virtual comparator
1 or more	Midlothian	2012	15.80%	17.60%
		2013	16.20%	19.00%
		2014	16.90%	20.00%
		2015	16.10%	21.80%
		2016	20.30%	23.20%
		3 yr avg	17.80%	21.70%
		4 yr trend	1.10%	1.40%

*Table 9: Breadth and Depth Measures by the end of S6  
(Source: Insight September 2016)*

Table 9 shows a positive four year trend across all measures and some important improvements including: 5.2% improvement in one or more qualifications at level 6; 3.7% improvement in three or more qualifications at level 6; and 4.2% improvement in one or more qualifications at level 7 by the end of S6. Despite these significant improvements, attainment remains lower than the virtual comparator by the end of S6.

Next steps for improvement: To continue to focus on attainment by the end of S6 in order to bring in line with the virtual comparator.

### **3 Report Implications**

#### **3.1 Resource**

The Education Leadership Teams, all Head Teachers and staff are committed to closing the attainment gap and this will remain a key priority as we move forward.

#### **3.2 Risk**

Addressing Inequalities by closing the attainment gap is of significant importance in order to improve the life chances of children and young people in our care.

#### **3.3 Single Midlothian Plan and Business Transformation**

Themes addressed in this report:

- ☐ Community safety
- ☐ Adult health, care and housing
- ☒ Getting it right for every Midlothian child
- ☐ Improving opportunities in Midlothian
- ☐ Sustainable growth
- ☐ Business transformation and Best Value
- ☐ None of the above

#### **3.4 Key Priorities within the Single Midlothian Plan**

Girfec 5: Our people will be successful learners, confident individuals, effective contributors and responsible citizens.

#### **3.5 Impact on Performance and Outcomes**

To close the gap by improving 'attainment versus deprivation' and 'attainment for all' outcomes for children and young people.

#### **3.6 Adopting a Preventative Approach**

The Education (Scotland) Act 2016 aims to take preventative action in order to close the attainment versus deprivation gap by implementing key policies and programmes which are designed to target support to children and young people from disadvantaged communities. This 2016 Attainment Report highlights our commitment to closing the attainment gap which complements the strategies employed by Midlothian which were highlighted in the National Improvement Framework report which was presented to Council on 3 November 2015.

#### **3.7 Involving Communities and Other Stakeholders**

All Head Teachers update their Parent Councils on progress in terms of attainment and all schools publish their Standards and Quality reports for Parents and other stakeholders.

#### **3.8 Ensuring Equalities**

The recommendations in this report should continue to promote equity of attainment for disadvantaged children and support the steps being taken towards narrowing the attainment gap by imposing duties on education authorities and the Scottish Ministers in relation to reducing pupils' inequalities of educational outcome together with a duty to report on progress.

#### **3.9 Supporting Sustainable Development**

There are no impacts arising directly from this report.

#### **3.10 IT Issues**

There are no IT issues identified arising directly from this report.

## **4 Recommendations**

Council is recommended:

- To note the significant improvements in performance outlined in this report;
- To note the next steps for improvement;
- To note that the Council has previously agreed to holding an annual seminar in December to outline progress in raising attainment; and
- To note that the Council has previously agreed to receiving a report in May and December each year outlining progress made in raising attainment in Midlothian.

**Date 28 November 2016**

**Report Contact:**

Name: Dr Grace Vickers, Head of Education Tel No 0131 271 3719  
julie.currie@midlothian.gov.uk

