



Northern Ireland
Assembly

Research and Information Service Briefing Paper

Paper 185/12

28 November 2012

NIAR 842-12

Robert Barry

Equality Issues in Recruitment to the Northern Ireland Civil Service

Summary

Analysis of recruitment competition outcomes in recent years suggests that some consistently occurring inequalities may exist within the Northern Ireland Civil Service (NICS) recruitment process.

Examination of equality monitoring information made available by the Department of Finance and Personnel, in relation to the results of selection tests used in recruitment competitions, suggests that females, Catholics, disabled and older candidates are, in general, less likely than their counterparts to make it through to the next stage of the competition.

From the available information on seven recruitment competitions (involving a total of nine selection tests) between 2007 and 2011, the following points emerged:

- Males performed better than females in 9 out of 9 tests.
- Protestants performed better than Catholics in 8 out of 9 tests.
- Candidates without a disability performed better than those with a disability in 5 out of 6 tests.
- Younger candidates performed better than older candidates in 8 out of 8 tests.

It should be noted that not all of the above differences are statistically significant and the tests are not all the same, but there appears to be a fairly consistent pattern to the outcome. Males, Protestants, those without a disability and younger age groups generally perform better in these tests.

While the Department has provided a fairly robust response in relation to its selection procedures and the actions it has taken to minimise the risk of bias, the question of whether or not the selection tests contain inherent bias remains unanswered.

Furthermore, it would appear that the adverse impact of NICS selection tests for females and Catholics (particularly in relation to the Executive Officer II competitions) has remained consistent and unchecked for at least 10 years. From the Department's response, it is not clear what specific action is going to be taken to investigate the reasons for this.

The available data also suggests that the Department might want to look more closely at the interview performance of different groups, particularly with regard to gender, age and disability, to see if there is any consistent adverse impact occurring during that part of the selection process.

1 Introduction

Equality monitoring statistics for the Northern Ireland Civil Service (NICS) were recently published by the Northern Ireland Statistics and Research Agency (NISRA) based on staff in post at 1 January 2012.¹ The key points to emerge from this publication were as follows:

- The composition of the Northern Ireland Civil Service (NICS) at 1 January 2012 was 50.2% male and 49.8% female. As regards community background, 52.8% of staff were Protestant and 47.2% were Catholics. The proportion of staff who were from minority ethnic groups was 0.2% and the proportion of staff who had declared a disability was 5.3%.
- The NICS has an older age profile than that of the economically active population. The average age (median) of staff has increased from 39 in 2000 to 44 in 2012.
- Over the period 2000-2012 female representation increased from 47.9% to 49.8%. While it remains the case that in general the more senior the level of job the lower the representation of females, there have been substantial increases over this period in the representation of females in senior grades, particularly at Grade 5 level and above where female representation has increased from 11.3% to 32.5%.
- A similar pattern was evident, but less marked, in the case of community background, with the proportion of staff who were Catholic being highest in the most junior grades and lowest in the most senior grades. Since 2000 the NICS has seen Catholic representation rise by 5.5 percentage points. The largest changes have occurred in the higher management grades (18.2 percentage points at Grades 6/7 and 14.8 percentage points at Grade 5 and above).
- During 2011, the Northern Ireland Civil Service (NICS) held a total of 65 recruitment competitions and 66 promotion competitions. A total of 14,297 applications were received in recruitment competitions, resulting in 259 appointments. A total of 1,550 applications were received in promotion competitions, resulting in 211 staff being promoted.

¹ Department of Finance and Personnel, 'Equality Statistics for the Northern Ireland Civil Service (Based on staff in post at 1 January 2012)', report produced by Northern Ireland Statistics and Research Agency, September 2012.

- Analysis of recruitment competitions which had a closing date in 2011 indicates that at an aggregate level there were no inequalities in outcome with respect to gender and community background. The number of appointees aged 25-34, however, was higher than the 'expected' number, while the number of appointees in the other age categories was lower than expected.
- Analysis of promotion competitions in 2011 indicates that more Protestants and more females were successful than would have been expected if within each competition there had been equality of outcome in terms of gender and community background.

The temporary embargo on recruitment and promotion within the General Service grades in 2010 significantly reduced the level of external recruitment and promotion within the NICS during that year. Analysis of the relatively small number of appointments (78) and promotions (86) indicated that the profile of successful candidates, in 2010, was broadly in line with what was expected across the equality categories.²

In their previous equality monitoring report (published in June 2010), however, NISRA concluded that:

"Analysis of recruitment competitions from which people were appointed in 2008/09 indicates imbalances in outcome at an aggregate level across the equality categories."³

The number of male appointees, Protestant appointees, white appointees and appointees without a declared disability were each higher than the 'expected' number.

Further analysis of recruitment competition outcomes in recent years also suggests that some consistently occurring inequalities may exist within different stages of the recruitment process.

² Department of Finance and Personnel, 'Equality Statistics for the Northern Ireland Civil Service (Based on staff in post at 1 January 2011)', report produced by Northern Ireland Statistics and Research Agency.

³ Department of Finance and Personnel, 'Equality Statistics for the Northern Ireland Civil Service (Based on staff in post at 1 January 2010)', report produced by Northern Ireland Statistics and Research Agency, June 2010.

2 Selection Tests

In its guidelines on selection testing, the Equality Commission for Northern Ireland recommends that employers should only use tests “which have been assessed as having no discriminatory impact on any of the statutory equality grounds.”⁴

The NICS uses selection tests for shortlisting purposes at the early stages of high volume recruitment competitions. The most recent equality monitoring report summarises the selection test results for the two main recruitment competitions held during 2011 as follows:

“There were two high volume General Service recruitment competitions in 2011: Executive Officer II and Staff Officer (Fast Stream). In the Executive Officer II competition, males had a higher pass rate than females on the selection tests, particularly the online test. There were also community background differences in test performance with Protestants performing better in the tests than Catholics. In contrast, there were no significant gender or community background differences in test performance within the Staff Officer competition.”⁵

While the gender differences found for the 2011 Staff Officer selection test results were not statistically significant, they were in the same direction as those found for the EOII competition. Also, it seems that previous EOII selection tests have yielded similar results in terms of gender and community background differences (i.e. males performing significantly better than females and Protestants performing significantly better than Catholics).

From the available published information and from additional reports made available by the Department, it was possible to compare test results for the following NICS recruitment competitions:

- 2007 Administrative Officer (2,958 candidates tested)
- 2007 Degree Holder Competition (677 candidates tested)
- 2007 Executive Officer II (2,396 candidates tested)
- 2008 Administrative Assistant (768 candidates tested)
- 2009 Degree Holder Competition (1,190 candidates tested)

⁴ Equality Commission for Northern Ireland - <http://www.equalityni.org/site/default.asp?secid=home> (see under ‘employers’ and ‘recruiting staff’).

⁵ Department of Finance and Personnel, ‘Equality Statistics for the Northern Ireland Civil Service (Based on staff in post at 1 January 2012)’, report produced by Northern Ireland Statistics and Research Agency, September 2012.

- 2011 Executive Officer II
 - on-line test (5,251 candidates)
 - written test (1,832 candidates)
- 2011 Staff Officer
 - on-line test (1,880 candidates)
 - e-tray test (166 candidates)

Test success rates by gender, community background (Protestant/Catholic), disability and age (where reported) for the nine tests are summarised in Tables 1-4 below.⁶

	Male	Female
	%	%
2007 Administrative Officer	70.9	66.0
2007 Degree Holders	30.8	27.9
2007 EOII	52.8	33.6
2008 Administrative Assistant	86.4	85.6
2009 Degree Holders	9.2	7.6
2011 EOII (on-line test)	45.5	32.7
2011 EOII (written test)	52.7	46.5
2011 Staff Officer (on-line test)	6.8	5.6
2011 Staff Officer (e-tray test)	25.6	21.3

	Protestant	Catholic
	%	%
2007 Administrative Officer	70.0	67.3
2007 Degree Holders	33.8	22.2
2007 EOII	48.0	36.4
2008 Administrative Assistant	87.8	84.7
2009 Degree Holders	9.5	7.5
2011 EOII (on-line test)	41.0	36.7
2011 EOII (written test)	52.9	45.8
2011 Staff Officer (on-line test)	6.1	6.4
2011 Staff Officer (e-tray test)	24.7	22.2

⁶ Information was not available on any of the other Section 75 groups. Also, it should be noted that, in relation to Table 2, the 'Protestant' and 'Catholic' categories in some cases include a small number of 'not determined'. Where the number of 'not determined' was too small to publish (i.e. below 10), it was included with the next smallest category.

	No disability	Disability
	%	%
2007 Administrative Officer	68.5	58.6
2007 Degree Holders	N/A	N/A
2007 EOII	43.3	34.7
2008 Administrative Assistant	86.6	74.4
2009 Degree Holders	N/A	N/A
2011 EOII (on-line test)	39.3	30.7
2011 EOII (written test)	49.9	54.7
2011 Staff Officer (on-line test)	6.3	0.0
2011 Staff Officer (e-tray test)	N/A	N/A

	Best Performing	Worst Performing
2007 Administrative Officer	Age 20-24	Age 40+
2007 Degree Holders	Age 25-29	Age 35+
2007 EOII	Age 25-29	Age 40+
2008 Administrative Assistant	Age 20-24	Age 40+
2009 Degree Holders	N/A	N/A
2011 EOII (on-line test)	Age 25-34	Age 50+
2011 EOII (written test)	Age 25-34	Age 35-49
2011 Staff Officer (on-line test)	Age 25-34	Age 50+
2011 Staff Officer (e-tray test)	Age 25-34	Age 35+

The key points emerging from Tables 1-4 are as follows:

- Males performed better than females in 9 out of 9 tests.
- Protestants performed better than Catholics in 8 out of 9 tests.
- Candidates without a disability performed better than those with a disability in 5 out of 6 tests.
- Younger candidates performed better than older candidates in 8 out of 8 tests.

It should be noted that not all of the above differences are statistically significant and the tests are not all the same, but there appears to be a fairly consistent pattern to the outcome. Males, Protestants, those without a disability and younger age groups generally perform better in these tests.

While there is no evidence of any systematic investigation into the reasons for these differences, the Northern Ireland Statistics and Research Agency (NISRA) did conduct some follow-up analysis on the 2007 EOII competition results. From this follow-up work, NISRA concluded that:

“These analyses confirmed that the observed differences were not artefactual and that each of the categories [gender, community background and age-group], in their own right, influenced test score.”⁷

3 Interviews

Information on interview success rates was only available for three of the above competitions. Females, those without a disability and those aged 25-29 seem to have fared better in these interviews (see Tables 5-8 below).

	Male	Female
	%	%
2007 Administrative Officer	79.7	81.1
2007 EOII	47.0	59.1
2011 EOII	53.8	58.1

	Protestant	Catholic
	%	%
2007 Administrative Officer	78.7	82.7
2007 EOII	53.1	52.0
2011 EOII	54.3	57.5

	No disability	Disability
	%	%
2007 Administrative Officer	80.6	76.7
2007 EOII	52.5	44.4
2011 EOII	55.9	42.9

	Best Performing	Worst Performing
2007 Administrative Officer	Age 25-29	Age 40+
2007 EOII	Age 25-29	Age 16-24
2011 EOII	Age 25-34	Age 16-24

⁷ Northern Ireland Statistics and Research Agency, 'Analysis of the Outcomes of the 2007 Executive Officer II Competition', revised and enhanced June 2012.

4 Response from the Department

In response to the suggestion that further investigation might be necessary to rule out the possible occurrence of bias in NICS selection procedures, the Department of Finance and Personnel provided some additional information on analyses carried out by NISRA (i.e. the information used to compile Tables 1-8 of this report) and referred to these analyses as follows:⁸

“The Department uses such analyses to review and learn lessons from competitions it runs and to inform options on how best to proceed on future recruitment and appointment exercises...”

Corporate HR in the Department has responsibility for NICS staff resourcing policy and procedures. They are committed to ensuring that the recruitment and selection processes are effective and fair, that they represent good practice and, crucially, that they help to ensure that the best person is selected for the job. They seek to continuously review and improve the selection policies and processes. To that end they consult and work closely with a range of advisers and stakeholders. These include colleagues in Equality and Diversity Branch, who help them to identify any opportunities to address areas where there is a lack of fair participation in the workforce by using lawful affirmative action in recruitment exercises. Occupational psychologists in NISRA’s HR Consultancy Services advise on the use of assessment tests. They also access advice on good practice on competitions from HR professionals working with our strategic partner, HRConnect. The Civil Service Commissioners regulate recruitment in the NICS and recently the Department has also engaged with Commissioners specifically on how the effective use of psychometric testing can add value to recruitment and selection decisions and what represents good practice in this regard...

Advice was sought from occupational psychologists in NISRA on the use of testing as part of the assessment and selection process for EOII. The Department obtained advice on a suitable combination of valid and reliable tests to assess and shortlist candidates and to minimise any potential for adverse impact on applicants in relation to their age, gender, community background and whether they were internal or external candidates. In providing this advice NISRA considered test reliability and validation reports from reputable test publishers. Validation reports included the due diligence undertaken by the publishers to provide a level of assurance that their tests

⁸ Letter from Department to Assembly Researcher, dated 17 October 2012 (relevant extracts quoted).

do not have unjustifiable adverse impact for one group of people over another.

The selection process also included a structured interview, to assess shortlisted candidates' knowledge, skills and experience against the competence framework for Executive Officer II grade. As is always the case when interviews are used in the selection processes, preparations for the interview element took account of equality issues. Interview panels were constituted by members who were balanced in terms of gender and community background, all of whom had been trained in recruitment interviewing, including on issues relating to equity and fairness.

The detailed proposals for the EOII recruitment exercise were endorsed by NICS HR Directors. Trade Union Side was also advised.

NISRA's analysis of the 2007 EO11 competition was used to inform options and decisions for the 2011 EOII competition which was launched in September 2011. Taking this into account, further steps were taken to seek to minimise any potential adverse impact in the new competition. Based on a Differential Impact Analysis conducted by Equality and Diversity Branch, the decision was again taken to proceed with an open recruitment exercise to continue the objective to address lack of fair participation at our EOII grade. In particular there was extensive engagement with NISRA and HRConnect to research and to select suitable tests to short-list candidates for interview as part of the selection process.

As a result the Department changed the approach to testing used in the 2007 competition and used different e enabled tests from a different test provider to assess candidates' verbal reasoning and numerical skills. The on-line tests were followed by a further battery of paper tests to provide a shortlist of candidates to be invited to the structured, competence based interview. NISRA occupational psychologists, in addition to providing professional advice on the selection of tests, also specified the manner in which the tests would be combined to minimise, as far as practicable, adverse impact on particular groups and to select on merit. The proposals for the 2011 EOII competition were the subject of consultation with Trade Union Side and were agreed by HR Directors.

In relation to the 2007 Administrative Assistant and the 2008 Administrative Officer competitions a paper based test developed by Capita was used to identify and test candidates' levels of reasonable ability appropriate for

administrative staff. The selection process for AA grade did not involve an interview. It is acknowledged that the tests used for these competitions are now somewhat outdated and NISRA has now developed in-house work sample tests to be used in future recruitment campaigns for these administrative grades. These new tests have recently been piloted using existing NICS staff in these grades. NISRA has advised that no adverse impact in relation to community background or gender has been identified during the trials. Work is now underway with HRConnect to e-enable this test for future use...

You had raised the differences in test performances by gender and community background and differences in interview performance by gender in the 2007 EOII competition. Potential for adverse impact arises where, unintentionally, the success rate of a group (such as people of different gender, community background, age, disability etc), when compared to the success rate of another group is defined as statistically significant. Adverse impact does not mean that the selection process is necessarily unfair and it may be justifiable where the assessment methodology used is relevant to the requirement of the job. Notwithstanding, Corporate HR recognises the importance of keeping the recruitment and selection policies, processes and procedures under close scrutiny, working in consultation with professional colleagues to adhere to good practice and to ensure that, as far as possible, any potential for bias is minimised and that the right person is selected for the job. The Department's approaches to recruitment and selection are being included in a wider review of strategic staff resourcing which is currently underway."

While the Department has provided a fairly robust response in relation to its selection procedures and the actions it has taken to minimise the risk of bias, the question of whether or not the selection tests contain inherent bias remains unanswered. The analyses carried out by NISRA for equality monitoring purposes appear to confirm the existence of outcome bias. Further investigation would therefore be necessary to rule out the possibility of any procedural or inherent test bias. The Department, in reviewing the results of these analyses, must have known about the 'adverse impact' arising from the tests for some time now, yet it still continues to use them in the absence of any knowledge of the reasons behind this.

In their analysis of the 2007 EO II competition results, NISRA referred to the pattern of results in previous competitions (going back to 2001):

“The findings that, in the short-listing test, male candidates scored more highly than female candidates, and Protestant candidates scored more highly than Catholic candidates, are in line with the pattern observed in previous Executive Officer II and other high volume recruitment competitions in the NICS.”

It would appear that the adverse impact of NICS selection tests for females and Catholics has remained consistent and unchecked for at least 10 years. From the Department’s response, it is not clear what specific action is going to be taken to investigate the reasons for this. While NISRA make particular reference to the significantly poorer performance of females and Catholics in these tests, the outcomes for disabled and older candidates also require further investigation.

The Department might also want to look more closely at the interview performance of different groups, particularly with regard to gender, age and disability, to see if there is any consistent adverse impact occurring during that part of the selection process.