# Appendix 4 Algorithms likely to inform the 2006-07 widening participation allocations

# Purpose

1. This appendix details the algorithms likely to be used in calculating the 2006-07 widening participation (WP) allocations.

2. This appendix is aimed at expert readers with in-depth knowledge of the data. Readers are advised to have a copy of 'Specification of the individualised learner record for 2004/05' (available from the LSC) and 'HEIFES04: Higher Education in Further Education: Students Survey 2004-05' (HEFCE 2004/32) to hand when using this appendix. They should also have copies of their institution's finalised 2004-05 grant tables.

# 2004-05 ILR F04 fields used in the widening participation derived statistics algorithms

3. Only certain fields, detailed in Table 10, will be used to generate the WP allocation fields.

4. Throughout this appendix, fields taken from the ILR F04 return or derived for the WP allocations are shown in capitals using the names given in Tables 8 and 9.

## Using the individualised file

5. When working through this appendix it is necessary to use the individualised file WP04YYYYY.ind, where YYYYYY is the provider number ST\_UPIN (L01) for the college. Details of how to access this file are given in Annex E. This will show the allocation of students to cells within the tables and, where relevant, details of why they were excluded. Use the instructions provided in paragraph 7 of Appendix 1.

				Column in individualised
Field code	Description	Name	Dataset	file*
L01	Provider number	ST_UPIN	Learner	Α
L02	Contract/Allocation type	ST_ALLNO	Learner	С
L03	Learner reference number	ST_REF	Learner	D
L11	Date of birth	ST_DOB	Learner	Q
L17	Home postcode	ST_POSTC	Leaner	S
L24	Country of domicile	ST_DOMIC	Learner	R
L29	Additional support	ST_SUPPA	Learner	Т
A05	Sequence number	QA_SEQNO	Learning aim	E
A09	Learning aim reference	QA_AIM_R	Learning aim	BC
A11	Source of funding other than the LSC (occurs twice)	QA_FEHE1 / QA_FEHE2	Learning aim	M, N
A27	Learning start date	QA_ST_DA	Learning aim	0
A28	Learning planned end date	QA_EXP_E	Learning aim	Р
H09	Learner instance number	HQ_NUMHU	HE	F

## Table 8 ILR F04 fields likely to inform the widening participation allocations

H11	Highest qualification on entry	HQ_QUAL_ HE	J	
H13	Type of programme year	HQ_PYTYP HE	K	
H22	UCAS applicant number	HQ_UCAS HE	L	
H26	Number of A-levels	HQ_ALEVS HE	U	
H27	A/AS level score	HQ_A_LEV HE	V	
H28	Number of SCE Highers and CSYS	HQ_HIGHR HE	W	
H29	Scottish Higher points score	HQ_HIGHP HE	X	
H30	Number of vocational qualifications	HQ_VOCQU HE	Y	

\* The individualised file WP04YYYYY.ind, downloadable from the web (see Annex E for further details).

#### **Description of derived fields**

6. This section provides details of the derived fields in the individualised data file. These fields are used in calculating the WP allocations.

Field name	Description	Paragra ph	Column in individualised file*
AGEGRP	Age group	14	AP
AHPTS	A-level/Scottish higher points	26	AX
CASWARD	2001 census ward of the student's home postcode	21	AY
CRSELGTH	Length of course in years	7	AW
DISALLOC	Flag indicating inclusion to inform disability allocation	11	AN
DISPOP	Flag indicating inclusion in the disability allocation population	10	AM
EDMQUIN	Educational attainment quintile of mature full-time student's census ward	23	AU
EDPOPM	Flag indicating inclusion in mature full-time widening access allocation population	18	AR
EDPOPPT	Flag indicating inclusion in part-time widening access allocation population	19	AS
EDPTQUIN	Educational attainment quintile of part-time student's census ward	24	AV
ENTQUAL	Grouping of student's highest qualification on entry	27	AJ
ENTRANT	Flag indicating students in their first year of programme of study	12	AO
ENTRYAGE	GE Student's age on commencement of programme of study		BA
EQGRP	Entry qualification risk group	28	AH
EQPOP	Flag indicating whether the student is in the	25	AG

#### Table 9 Derived fields used to inform the WP allocation

	population for the full-time improving retention allocation		
EQWEIGHT	Entry qualification weighting	29	AI
EXCLPC	Flag indicating whether postcode was mapped to census data		AX
HEFCOL4 <sup>†</sup>	Flag indicating whether the student is included in Column 4	51	AE
HEFESFTE <sup>†</sup>	FTE for the year of programme of study	34	AC
HEFEXCL <sup>†</sup>	Exclusion reason(s)	42-43	<u> </u>
HEFLEVEL <sup>†</sup>	Level of study	15	Ζ
HEFMODE <sup>†</sup>	Mode of study	14	AA
HEFQAIM <sup>†</sup>	Recognised as HE qualification aim		AB
HEFTYPE <sup>†</sup>	Fundability status		AD
HIGHQUAL	Flag indicating whether student has an equivalent or higher qualification than the current qualification aim		AF
ILRKEY <sup>†</sup>	Unique learning aim identifier	12	G
PGDSA	Postgraduate DSA eligibility	9	AL
STUBID <sup>†</sup>	Unique year of programme of study identifier	20-21	H
UGDSA	Undergraduate DSA eligibility	8	AK
WARD6_C	1991 census ward of the student's home postcode	20	BB
YNGPART	Flag indicating inclusion in young full-time widening access allocation population	17	AQ
YNGQUIN	Participation quintile of young full-time student's census ward	22	AT

\* The individualised file WP04YYYYY.ind, downloadable from the web (see Annex E for details).

<sup>†</sup> The algorithms for deriving these fields are given in Appendix 1.

CRSELGTH (Column AW in individualised file WP04YYYYY.ind)

7. This is the number of years between QA\_ST\_DA (A27) and QA\_EXP\_E (A28) rounded up.

UGDSA (Column AK in individualised file WP04YYYYY.ind)

8. This field indicates the Disabled Students Allowance (DSA) eligibility status for undergraduates, including students on Postgraduate Certificates of Education (PGCEs).

Value	Description	Definition
1	Undergraduate eligible for DSA	ST_DOMIC (L24) = 399, 599, 299, 099 and (HEFLEVEL = UGX, FD or HEFQAIM = PGCE) and (HEFMODE = FTS, SWOUT or (HEFMODE = PT and HEFESFTE $\geq$ 50))
0	Undergraduate ineligible for DSA	Otherwise

PGDSA (Column AL in individualised file WP04YYYYY.ind)

9. This field indicates the DSA eligibility status for postgraduates, excluding students on PGCEs.

Value	Description	Definition
1	Postgraduate eligible for DSA	ST_DOMIC (L24) = 399, 599, 299, 099 and HEFLEVEL = PG and HEFQAIM $\neq$ PGCE and (QA_FEHE1 (A11A) $\neq$ 007 or QA_FEHE2 (A11B) $\neq$ 007) and ((HEFMODE = FTS, SWOUT and CRSELGTH $\geq$ 1) or (HEFMODE = PT and HEFESFTE $\geq$ 50))
0	Postgraduate ineligible for DSA	Otherwise

DISPOP (Column AM in individualised file WP04YYYYY.ind)

10. This flag indicates whether the student was included in the denominator of the disability allocation proportions.

Value	Description	Definition
1	Included in the denominator of the disability allocation proportions	HEFCOL4 = 1 and HEFTYPE = HOMEF, HOMEIF, HOMENF and (UGDSA = 1 or PGDSA = 1)
0	Not included in the denominator of the disability allocation proportions	Otherwise

#### DISALLOC (Column AN in individualised file WP04YYYYY.ind)

11. This flag indicates whether the student is likely to be included in the numerator of the disability allocation proportion calculations.

Value	Description	Definition
1	Included in the numerator of the disability allocation proportions	DISPOP = 1 and ST_SUPPA (L29) = 71
0	Not included in the numerator of the disability allocation proportions	Otherwise

ENTRANT (Column AO in individualised file WP04YYYYY.ind)

12. This field identifies students in their first year of programme of study.

Value	Description	Definition
1	Entrant	(HQ_PYTYP (H13) = 1 and QA_ST_DA (A27) ≥ 1 August 2004 and QA_ST_DA (H27) ≤ 31 July 2005) or
		(HQ_PYTYP (H13) ≠ 1 and QA_ST_DA (A27) ≥ 1 August 2003 and QA_ST_DA (A27) ≤ 31 July 2004)
0	Not an entrant	Otherwise

ENTRYAGE (Column BA in individualised file WP04YYYYY.ind)

13. This field contains the student's age at the commencement of the programme of study. ENTRYAGE =  $(QA_ST_DA (A27) - ST_DOB (L11))/365.25$  rounded down to the nearest whole number.

AGEGRP (Column AP in individualised file WP04YYYYY.ind)

14. This field contains the student's age group using ENTRYAGE.

Value	Description	Definition
1	Less than 21 years of age	ENTRYAGE < 21
2	Greater than or equal to 21 and less than 25 years of age	ENTRYAGE ≥ 21 and ENTRYAGE < 25
3	Otherwise	Otherwise

HIGHQUAL (Column AF in individualised file WP04YYYYY.ind)

15. This field identifies students that have not previously studied for their qualification aim, or a higher qualification aim.

Value	Description	Definition
1	Student has not previously studied for their qualification aim, or a higher qualification aim	(HQ_QUAL_ (H11)= 21, 22 ) or (HQ_QUAL_(H11) = 23 to 28, 31 and HEFQAIM = FIRST) or (HQ_QUAL_(H11) = 30 and HEFQAIM = FIRST, FOUDEG) or HQ_QUAL_(H11) = 29, 39 to 99
0	Student has previously studied for their qualification aim, or a higher qualification aim	Otherwise

EXCLPC (Column AX in individualised file WP04YYYYY.ind)

16. This flag indicates whether the student's home postcode (ST\_POSTC)(L17) has been excluded from the mapping to 1991 and 2001 census ward data. Postcodes that are recognised as schools, prisons, hospitals and similar public institutions are excluded from the mapping.

**YNGPART** (Column AQ in individualised file WP04YYYYY.ind)

17. This flag indicates whether the student is included in the young, full-time widening access allocation population.

Value	Description	Definition
1	Included in young full-time widening access allocation population	EXCLPC = N and ST_DOMIC (L24) = 099, 299, 399, 599 and HEFTYPE = HOMEF and HEFCOL4 = 1 and AGEGRP = 1 and ENTRANT = 1 and HEFLEVEL = UGX, FD and HEFMODE = FTS
0	Not included in the population	Otherwise

EDPOPM (Column AR in individualised file WP04YYYYY.ind)

18. This flag indicates whether the student is included in the mature, full-time widening access allocation population.

Value	Description	Definition
1	Included in mature full-time widening access allocation population	EXCLPC = N and ST_DOMIC (L24) = 399, 599 and HEFTYPE = HOMEF and HEFCOL4 = 1 and AGEGRP = 2, 3 and ENTRANT = 1 and HEFLEVEL = UGX, FD and HEFMODE = FTS
0	Not included in the population	Otherwise

EDPOPPT (Column AS in individualised file WP04YYYYY.ind)

19. This flag indicates whether the student is included in the part-time widening access allocation population.

Value	Description	Definition
1	Included in the part-time widening access allocation	EXCLPC = N and ST_DOMIC (L24) = 399, 599 and HEFTYPE = HOMEF and HEFCOL4 = 1 and
	population	ENTRANT = 1 and HEFLEVEL = UGX, FD and HEFMODE = PT
0	Not included in the population	Otherwise

WARD6\_C (Column BB in individualised file WP04YYYYY.ind)

20. This field contains the 1991 census ward of the student's home postcode (ST\_POSTC)(L17).

CASWARD (Column AY in individualised file WP04YYYYY.ind)

21. This field contains the 2001 census ward of the student's home postcode (ST\_POSTC)(L17).

YNGQUIN (Column AT in individualised file WP04YYYYY.ind)

22. This field indicates the young participation quintile of the student's 1991 census ward (WARD6\_C) and is only populated for students in the young full-time widening access population (YNGPART = 1). Values are 1 to 5, with 5 being the quintile of highest participation.

EDMQUIN (Column AU in individualised file WP04YYYYY.ind)

23. This field indicates the educational attainment quintile of the student's 2001 census ward (CASWARD) and is only populated for students in the mature full-time widening access population (EDPOPM = 1). Values are 1 to 5, with 5 being the quintile of highest educational achievement. Students with HIGHQUAL = 0 or (HIGHQUAL = 1 and HQ\_QUAL\_(H11) = 99) are set to 5.

EDPTQUIN (Column AV in individualised file WP04YYYYY.ind)

24. This field indicates the educational attainment quintile of the student's 2001 census ward (CASWARD) and is only populated for students in the part-time widening access population (EDPOPPT = 1). Values are 1 to 5, with 5 being the quintile of highest educational achievement. Students with HIGHQUAL = 0 or (HIGHQUAL = 1 and HQ\_QUAL\_(H11) = 99) are set to 5.

EQPOP (Column AG in individualised file WP04YYYYY.ind)

25. This flag indicates whether the student was included in the calculation of the entry-qualification-based widening participation funding allocation.

Value	Description	Definition
1	Included in entry-qualification-based widening participation allocation	HEFCOL4 = 1 and ENTRANT = 1 and ST_DOMIC(L24) = 099, 299, 399, 599 and HEFTYPE = HOMEF, HOMEIF and HEFLEVEL = UGX, FD and HEFMODE = FTS, SWOUT
0	Not included in entry-qualification-based widening participation allocation	Otherwise

AHPTS (Column AX in individualised file WP04YYYYY.ind)

26. This field contains the number of A-level or Scottish Higher points for the student. It is taken to be the maximum of the student's HQ\_A\_LEV(H27) and HQ\_HIGHP(H29).

ENTQUAL (Column AJ in individualised file WP04YYYYY.ind)

27. This field contains the student's entry qualifications.

Value	Description	Definition	
DEG Degree and higher		HQ_QUAL_(H11) = 01 to 05, 10 to 13	
OHE Other HE		HQ_QUAL_(H11) = 15, 16, 21 to 25, 27, 28, 30	
FOU Foundation course		HQ_QUAL_ (H11) = 29, 43	
ACCESS	Access course	HQ_QUAL_(H11) = 48	
AH	A-levels and Scottish Highers	HQ_QUAL_(H11) = 39 or	
		(HQ_QUAL_(H11) = 40 and HQ_VOCQU(H30) ≠ 01 to 03, 97 and (HQ_ALEVS (H26) ≠ 98, 99, blank or HQ_HIGHR (H28) ≠ 98, 99, blank))	
BACC	Baccalaureate	HQ_QUAL_(H11) = 47	
UNKNOWN	Unknown entry qualifications	HQ_QUAL_(H11) = 99	
OTHER	Other and no formal qualifications	Otherwise	

EQGRP (Column AH in individualised file WP04YYYYY.ind)

Value	Description	Definition
Y_L	Young, low risk	ENTRYAGE < 21 and (ENTQUAL = DEG, BACC, UNKNOWN or (ENTQUAL = AH and (AHPTS $\geq$ 19 or (AHPTS = 0 and HQ_UCAS (H22) $\neq$ 000000000))))
Y_M	Young, medium risk	ENTRYAGE < 21 and (ENTQUAL = FOU, OHE or (ENTQUAL = AH and ((AHPTS $\ge$ 9 and AHPTS < 19) or (AHPTS = 0 and HQ_UCAS (H22) = 00000000))))
Y_H	Young, high risk	ENTRYAGE < 21 and not above
M_L	Mature, low risk	ENTRYAGE $\ge$ 21 and (ENTQUAL = DEG, UNKNOWN or (ENTQUAL = AH and (AHPTS > 24 or (AHPTS = 0 and HQ_UCAS (H22) $\neq$ 00000000))))
M_M	Mature, medium risk	ENTRYAGE $\ge$ 21 and (ENTQUAL = OHE, FOU, ACCESS or (ENTQUAL = AH and (AHPTS $\le$ 24 or (AHPTS = 0 and HQ_UCAS (H22) = 00000000))))
M_H	Mature, high risk	ENTRYAGE $\geq$ 21 and not above

28. This field holds the entry-qualification risk group the student was assigned to.

EQWEIGHT (Column AI in individualised file WP04YYYYY.ind)

29. This field holds the weight for the entry-qualification-based widening participation allocation.

	Definition
0	EQGRP = Y_L, M_L
1	EQGRP = Y_M
1.5	EQGRP = Y_H, M_M
2.5	EQGRP= M_H