Australian Government

Department of Industry, Innovation, Climate Change, Science, Research and Tertiary Education

TOWARDS A PERFORMANCE MEASUREMENT FRAMEWORK FOR EQUITY IN HIGHER EDUCATION

Summary of a project conducted by the Australian Institute of Health and Welfare

Equity in Higher Education Policy Forum

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Contents

Context

To fulfil its ambition of improving access and equity in the higher education sector, the Australian Government has invested in equity programs that support universities' efforts to widen participation. These equity programs target specific groups that are underrepresented in higher education, including Indigenous Australians, those from low socioeconomic status (low SES) areas, people who live in regional and remote areas, and those with disabilities. The Government has set a target that by 2020, 20% of domestic higher education enrolments at the undergraduate level will be students from low SES areas.

To understand whether equity outcomes are improving it is necessary to have a method of measuring those outcomes. A comprehensive performance measurement framework for equity outcomes in higher education is needed. Regular measurement of progress, or lack thereof, combined with evidence about the most effective equity interventions, is critical to bringing about change in equity outcomes.

In this context the Department commissioned the Australian Institute of Health and Welfare (AIHW) to develop a conceptually-based performance measurement framework for equity (MFE) in higher education.

Development of the MFE

The task that the Department set the AIHW was to use the [National Aboriginal and Torres Strait Islander Health Performance Framework](#) as a model for developing a similar, three-tiered, performance measurement framework for equity in higher education. The measurement framework was to include equity outcomes, determinants of equity outcomes, and indicators of system performance.

Following an analysis of similar measurement frameworks, the AIHW has developed an initial version of a conceptually-based measurement framework for equity in higher education. It can be used to monitor progress in achieving equity outcomes and that can form a starting point for consultation with the higher education sector and other key stakeholders. The framework was developed using two stages.

Stage 1: The four phases of the student education cycle

Four key phases in the university education of students were posited:

- Pre-entry phase (aspirations and enrolments)
- Offers, acceptance, and enrolment
- Experience during university
- Post-graduate outcomes

A series of proposed indicators was developed to match on to the specific inputs, outputs, and outcomes for each of these four phases, along with suggested data sources. The approach yielded 56 indicators across the four phases. Acknowledging the significant reporting burden already experienced by universities, the proposed set of indicators requires little additional reporting by universities.

Stage 2: The three-tier model

The second stage supplemented the indicators from Stage 1 with indicators that focused on precursors of higher education attainment, and to reorganise the phase-related indicators into a

three-tier model based on the structure of the National Aboriginal and Torres Strait Islander Health Performance Framework. The proposed tiers for the MFE in higher education are:

- Tier 1—Educational attainment and outcomes
- Tier 2—Precursors of higher education attainment
- Tier 3—Educational system performance

Tier 1 focuses on educational attainment and outcomes for students in the higher-education sector and includes measures of domestic undergraduate enrolments and completions as well as post-graduation outcomes (23 indicators).

Tier 2 includes measures of the precursors of higher education attainment, such as school performance and aspirations (9 indicators), while Tier 3 focuses on the efforts and strategies of the university and government sectors to improve equity outcomes, such as outreach strategies, financial support, and support strategies during university (29 indicators).

Each of the proposed indicators would be disaggregated by equity group where data permit (low SES, Indigenous, regional/remote, disability status, non-English speaking background) and year.

The final proposed MFE for further consultation thus includes a total of 61 indicators across the three tiers: 9 input indicators, 20 output indicators, 27 outcome indicators, and 5 precursor indicators.

For ease of reading of subsequent parts of this document, the current commonly-used equity performance indicators are described in Box 1.

Box 1: Definitions of commonly used equity performance indicators

Access rate	number of students in an equity group commencing university as a percentage of all commencing domestic students
Participation rate	number of students in an equity group enrolled as a percentage of all domestic students enrolled
Retention rate	number of students in an equity group who re-enrol in a given year as a percentage of domestic students who were enrolled in the previous year (less the number who completed their course)
Success rate	Equivalent Full-time Student Load (EFTSL) of units passed as a percentage of all EFTSL of units attempted
Completion rate	number of students in an equity group that complete a course in a given year as a percentage of completions among all domestic students

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Stage 1 detail: Four phase, student education cycle stage

Phase 1: Pre-entry

The first step in meeting the equity targets for higher education enrolment is to increase applications to attend university from people from low SES backgrounds, regional and remote areas, Indigenous Australians, and those with disabilities.

To achieve this goal, universities are receiving funding to address barriers through community partnership programs, academic preparation, mentoring, and by offering alternative pathways into university that do not rely on a particular ATAR score or on transitioning immediately to university from high school.

The proposed indicators ([Table 1](#)) cover two inputs (amount of funding; the number of planned programs or activities), four outputs (number and types of activities or programs run; two measures of the extent of the reach of the programs or activities; and the number and type of alternative pathways into university that are offered). These indicators are essential for capturing where efforts are being targeted and the extent of their reach.

Seven of the proposed outcomes measure whether there is subsequent change in aspirations or applications to university from equity groups. Improvements in these indicators over time would signal that the investment and effort from the Government and universities may be having some effect (although they would not be the only factors responsible). If applications from members of equity groups do not increase then efforts might need to be shifted or refocused.

Phase 2: Offers, acceptances, and enrolment

The second step in meeting the equity targets for higher education enrolment is to increase offers, acceptances and enrolments of people from low SES backgrounds, regional and remote areas, Indigenous Australians, and those with disabilities.

To meet this goal universities are using a range of strategies, including the use of alternative entry criteria or pathways, and providing financial, academic, and social supports to students from equity groups.

The proposed indicators ([Table 2](#)) for this phase include three inputs (amount of funding; the number of planned programs or activities; planned equity targets at the university level), two outputs (number of activities or programs run; the extent of the reach of those programs or activities), and eight outcome variables focusing on the change in offers, acceptances, enrolments, and the percentage of universities meeting their enrolment targets.

Phase 3: University experience

Phase 3 focuses on students' experiences at university. Universities have received funding through the Higher Education Participation and Partnerships Program, the Higher Education Disability Support Program, and the Indigenous Support Program to provide programs and supports to university students from underrepresented groups so as to improve their overall experiences at university and lead to greater success, retention and completion rates ([Table 3](#)). The strategies universities use include tutoring, social support, additional supports for students with disabilities, ensuring that coursework is culturally relevant, and addressing the culture at the university to ensure that it is socially inclusive.

The proposed indicators for this phase include two inputs (amount of funding; number of planned programs or activities), 10 outputs, and six core outcome variables focusing on the change in success rates, retention rates, completion rates, and student satisfaction with support.

Phase 4: Post-graduate outcomes

Phase 4 focuses on post-graduate outcomes to ensure that they reflect positively on the investments (financial, time, etc.) that students have made in obtaining an undergraduate degree ([Table 4](#)). Post-graduate outcomes are particularly important for students from underrepresented groups, not just in terms of fairness and equity in general, but also for the social impact of affecting aspirations in families and communities.

Universities use several strategies to improve the post-graduate outcomes of all their students, as well as students from underrepresented groups. These strategies include the provision of career counselling and pathways, traineeships, internships, and promoting post-graduate study opportunities.

The proposed indicators for this phase include two inputs (amount of funding; number of planned programs or activities), four outputs, and six outcome variables focusing on employment and graduate study in the short and long term post-graduate study.

Table 1: Proposed indicators for Phase 1: Pre-entry (includes secondary school students and mature age/non-school leavers)

Goal 1: *Increase aspirations of attending university among underrepresented groups*

Goal 2: *Increase applications to university from underrepresented groups*

Process: Universities will identify underrepresented groups/communities and address existing barriers to university awareness, aspiration, and application through effective community partnership programs such as outreach, academic preparation, mentoring/role modeling, etc… and by offering alternative pathways into university

Type	Measure	Indicator	Justification	Data source(s)	Level at which indicator can be reported
Inputs	Government investment	Amount of funding by type of program (e.g. HEPPP, ISP)	The amount of funding (overall and per university) is a marker of Government priorities and investment in equity measures. Funding levels help determine the number of programs universities can run and their reach.	DIISRTE, yearly beginning 2010	Individual university Jurisdiction By program (e.g. HEPPP) National
	Planned interventions and priorities	The number and types of interventions by source of funding and target equity group	Documenting the types of supports universities planned to deliver will allow comparisons between universities as well as paint a national picture of types of programs, policies, and priorities which will also help identify gaps.	DIISRTE, 3 yearly mission-based compacts Special grants funding cycles	Individual university National Jurisdiction By type of intervention/program By target group
Outputs	University implementation of partnership building programs	The number and type of partnership activities by type of program and target group	These data represent what universities were able to achieve in practice. They can be compared to what was proposed and provide an aggregate view of target groups and type of strategies.	University reports to DIISRTE, yearly	Individual university National By type of activity (e.g. mentoring, outreach) By target group
	Reach of the partnership programs	The number of participants taking part in or affected by the activities, by type of activity and target group	These data are essentially for monitoring progress and setting realistic expectations – if students/schools/communities are not participating in the programs, then they are unlikely to have any effect on the desired outcomes.	University reports to DIISRTE, yearly	Individual university National By type of activity (e.g. mentoring, outreach) By target group
		Proportion of students who attended a university information session at a university or by a person from the university.	This indicator captures changes in time across the population and from the students' perspective.	LSAY	National By equity group

Type	Measure	Indicator	Justification	Data source(s)	Level at which indicator can be reported
Outputs (continued)	Provision of alternative pathways to university	Types of alternative pathways offered into university (e.g. direct application, bonus ATAR points for target groups, entry from TAFE or pre-university prep course)	This indicator provides a summary of the type of pathways offered by universities which has been linked with increasing access and participation.	Not currently collected as part of any collection, but available from universities	University National By type
Outcomes	Aspirations	Proportion of students who were influenced by University representatives who visited their school	Captures whether outreach programs actually affect students	LSAY	National Jurisdiction By equity group
		Proportion of 15 year olds who intend to apply to university after finishing school	Captures whether there has been change in aspirations for attending university among both students and parents –key policy goals for the universities and the Government	LSAY	National Jurisdiction By equity group
		Proportion of 15 year olds whose parents want them to apply to university after finishing school		LSAY	National Jurisdiction By equity group
		Proportion of 15 year olds who expect to complete a university degree		LSAY	National Jurisdiction By equity group
	Applications	Proportion of year 12 students who apply to university by equity group	Increasing applications from members of equity groups is a key precondition for increasing enrolments. This indicator focuses on year 12 leavers, while the following focuses on proportions of all applicants.	DEEWR University Applications and Offers (for number of year 12 applications), yearly; ABS NSSC for denominator, annual (DEEWR from 2008; NSSC from 1984)	National Jurisdiction
		Proportion of total applications by equity group		DEEWR University Applications and Offers data collection, yearly	University National Jurisdiction
		Proportion of applications by type of application pathway	Captures the extent to which students from equity backgrounds are taking advantage of alternative pathways.	DEEWR University Applications and Offers data collection, yearly Tertiary admissions centres Detailed data will need to be collected from universities	University National Jurisdiction

Table 2: Proposed indicators for Phase 2: Offers, acceptances, and enrolments (includes Year 12 and non-Year 12 applicants)

Goal 1: Increase offers made to applicants from underrepresented groups

Goal 2: Increase acceptances of offers made to applicants from underrepresented groups

Goal 3: Increase enrolments of students from underrepresented groups

Process: Universities will increase offers made to applicants from underrepresented groups through the use of alternative criteria or pathways, and provide supports which will increase acceptances and enrolments of students from equity groups.

Type	Measure	Indicator	Justification	Data source(s)	Level at which indicator can be reported
Inputs	Government investment	Amount of funding by type of program (e.g. HEPPP, ISP)	The amount of funding (overall and per university) is a marker of Government priorities and investment in equity measures. Funding levels help determine the number of programs universities can run and their reach.	DIISRTE, yearly beginning 2010	Individual university Jurisdiction By program (e.g. HEPPP) National
	Planned policies for increasing offers, acceptances and enrolments	The number and types of agreed-upon equity focused interventions by source of funding and target equity group	Documenting the types of supports universities planned to deliver will allow comparisons between universities as well as paint a national picture of types of programs, policies, and priorities which will also help identify gaps.	DIISRTE, 3 yearly mission-based compacts Special grants funding cycles	Individual university National Jurisdiction By type of policy By target group
	Targets set by universities for increasing enrolments by equity group	Low SES target Other equity group chosen and target	Essential for measuring progress against low SES target at the university level. The distribution of other groups targeted paints a picture of where priorities/gaps are.	Reward Funding agreements	Individual university By target group
Outputs	Policies and practices for increasing offers, acceptances and enrolments	The number and type of policies or practices by target group (e.g. bonus ATAR points awarded, guaranteed acceptance based on school attended, scholarships, etc.)	These data represent what universities were able to achieve in practice. They can be compared to what was proposed and provide an aggregate view of target groups and type of strategies.	University reports to DIISRTE, yearly	Individual university National By type of policy By target group
		Number of scholarships offered by target group	An increase in scholarships will indicate greater financial support for students from equity groups and may encourage enrolments.	DEEWR Higher Education Student Collection, yearly beginning 2008 (information on Commonwealth scholarships) University Administration Data	Individual university Jurisdiction National By type of scholarship (Commonwealth vs. University)

					By target group

Type	Measure	Indicator	Justification	Data source(s)	Level at which indicator can be reported
Outcomes	Offers made	Proportion of applicants who are made an offer	Current data show disparities in offer rates – students cannot attend if they are not made an offer.	DEEWR, University Applications and Offers, yearly beginning 2008	Jurisdiction National By target group
		Proportion of students who apply and are made an offer by type of application process (e.g. direct, Tertiary Admissions Centre)	Marker of whether the admission process or pathway affects offers made (which are likely to vary by equity group)	DIISRTE, Undergraduate Application, Offers and Acceptance, yearly, direct applications and offers first included in 2010	Individual university Jurisdiction National By target group
	Acceptance of offers	Proportion of applicants who receive an offer and reject it (by equity group and type of application pathway)	Indication of persistent barriers to enrolment and attendance at university	DEEWR, University Applications and Offers, yearly beginning 2008	Jurisdiction National By type of application (TAC or direct) By target group
		Proportion of applicants who defer the offer	Needs to be interpreted carefully – deferral may be made for reasons other than barriers (e.g. gap year, etc.)	DEEWR, University Applications and Offers, yearly beginning 2008 DIISRTE, Undergraduate Applications, Offers and Acceptance, yearly beginning 2008	Jurisdiction National By target group
	Enrolment	Proportion of applicants who receive an offer and enrol (by equity group and type of application)	Key indicator in all frameworks to measure improvements in equity	DEEWR, University Applications and Offers, yearly beginning 2008 Internal university data	Jurisdiction National By target group
		Proportion of enrolments by equity group		DEEWR, University Applications and Offers yearly beginning 2008	Jurisdiction National By target group
		Proportion of universities meeting their low SES targets	Provides a measure of university-level progress towards their goals	Mandatory university reporting for reward funding	Individual universities Jurisdiction National
		Proportion of universities meeting their other equity group target (by target group)		Mandatory university reporting for reward funding	Individual universities Jurisdiction National By target group (other than low SES)

Table 3: Proposed indicators for Phase 3: University experience

Goal: *Increase the success, retention, and completion rates of university students from equity groups*					
Process: Universities will provide programs and supports to university students from underrepresented groups that will improve their overall experiences at university and lead to greater success rates, retention rates and completion rates.					
Type	**Measure**	**Indicator**	**Justification**	**Data source(s)**	**Level at which indicator can be reported**
Inputs	Government investment	Amount of funding by type of program (e.g. HEPPP, ISP)	The amount of funding (overall and per university) is a marker of Government priorities and investment in equity measures. Funding levels help determine the number of programs universities can run and their reach.	DIISRTE, yearly beginning 2010	Individual university Jurisdiction National By program (e.g. HEPPP)
	Planned programs to support students from underrepresented groups while at university	The number and types of agreed-upon equity focused support strategies by source of funding and equity group(s) targeted	Documenting the types of supports universities planned to deliver will allow comparisons between universities as well as paint a national picture of types of programs, policies, and priorities which will also help identify gaps.	DIISRTE, 3 yearly mission-based compacts Special grants funding cycles	Individual university Jurisdiction National By type of strategy/activity By target group
Outputs	University implementation of support/participation programs	The number and type of support/participation activities by type of program and target group	These data represent what universities were able to achieve in practice. They can be compared to what was proposed and provide an aggregate view of target groups and type of strategies.	University reports to DIISRTE, yearly	Individual university Jurisdiction National By type of activity/strategy By target group
	Reach of the support/participation programs	The number and type of students partaking of the services, by type of activity and target group	These data are essentially for monitoring progress and setting realistic expectations – if students are not participating in the programs, then they are unlikely to have any effect on the desired outcomes.	University reports to DIISRTE, yearly	Individual university National By type of activity (e.g. tutoring, support groups, transition to university) By target group

Type	Measure	Indicator	Justification	Data source(s)	Level at which indicator can be reported
		Financial support			
Outputs (continued)		Proportion of students from equity groups receiving scholarships (by source – e.g. university-based, commonwealth based)	Financial constraints are often cited as a barrier to university attendance & retention among students from underrepresented groups – increases in the proportion of students from equity groups receiving financial support may increase retention.	DEEWR Higher Education Student Collection (particularly for Commonwealth scholarships) University administrative data collections (for other scholarships)	Individual university National Jurisdiction By equity group
		Number of equity scholarships awarded	These scholarships are specifically targeted at students from equity groups. An increase in the number of scholarships awarded indicates increased investment as well as met needs.	DEEWR Higher Education Student Collection (particularly for Commonwealth scholarships) University administrative data collections (for other scholarships)	Individual university National Jurisdiction By equity group
		Number and proportion of students receiving financial assistance through Austudy	Recent policy changes improving access to Centrelink student-related funding were partly designed to help improve the retention of students from disadvantaged backgrounds. Increased uptake is a measure of increased financial support.	Centrelink students collection	National Jurisdiction By equity group
		Number and proportion of Indigenous students receiving financial assistance through ABSTUDY		Centrelink students collection	National Jurisdiction
		Number and proportion of students receiving financial assistance through Youth Allowance		Centrelink students collection	National Jurisdiction By equity group
		Flexible study and course delivery			
		Proportion of students enrolled part-time	Differences in the proportions enrolled part-time by equity group may reflect either individual preferences or having to balance work, family, and education.	Higher Education Student Data Collection, annual	Individual university National By equity group
		Proportion of students that study externally or multi-modal	Flexible study options have been proposed as a method for increasing the participation and retainment of students from underrepresented groups, particularly those from regional and remote areas.	Higher Education Student Data Collection, annual	Individual university National By equity group
	Staff diversity	Proportion of staff members who identify as being of Indigenous origin	Reflects level of staff members with whom Indigenous students may be able to identify and level of diversity at the university as a whole	DEEWR Higher Education Staff Collection	Individual university National

Type	Measure	Indicator	Justification	Data source(s)	Level at which indicator can be reported
Outcomes	Success	Proportion of students who pass a unit that they are enrolled in	This set of indicators represents successful progression through university, and are key outcomes for identifying whether students from equity groups are achieving parity once they commence university.	DEEWR Higher Education Student data collection	National Jurisdiction By equity group
	Retention	Proportion of students who re-enrol in a course in a given year Denominator: number of students enrolled in the previous year minus those completed		DEEWR Higher Education Student data collection	National Jurisdiction By equity group
	Completion	Proportion of students who complete a course in a given year		DEEWR Higher Education Student data collection	National Jurisdiction By equity group
	Completion	Proportion of students who complete a course within 5 years of commencing university study		University administrative data collections	Individual university National Jurisdiction By equity group
	Student satisfaction with student support	Proportion of students satisfied with quality of teaching	Increases in these measures will be indicative of improvements in students' perceptions about the level of support they receive and the quality of teaching. Differences between equity groups and other students may highlight additional gaps.	Australian Graduate Survey - Course Experience Questionnaire (AGS-CEQ): Good teaching scale	Individual university National Jurisdiction By equity group
	Student satisfaction with student support	Proportion of students satisfied with level of student support		Australian Graduate Survey - Course Experience Questionnaire (AGS-CEQ): Student support scale	Individual university National Jurisdiction By equity group

Table 4: Proposed indicators for Phase 4: Post-graduate outcomes

Goal: *Improve the post-graduate outcomes (or returns to higher education) for students from underrepresented groups*					
Process: Universities will provide support to undergraduate students from underrepresented groups to support their transition from university into employment or further study.					
Type	**Measure**	**Indicator**	**Justification**	**Data source(s)**	**Level at which indicator can be reported**
Inputs	Government investment	Amount of funding by type of program (e.g. HEPPP, ISP)	The amount of funding (overall and per university) is a marker of Government priorities and investment in equity measures. Funding levels help determine the number of programs universities can run and their reach.	DIISRTE, yearly beginning 2010	Individual university Jurisdiction By program (e.g. HEPPP) National
	Planned supports to improve post-university outcomes	The number and types of agreed-upon equity-focused programs by source of funding and target equity group	Documenting the types of supports universities planned to deliver will allow comparisons between universities as well as paint a national picture of types of programs, policies, and priorities which will also help identify gaps.	DIISRTE, 3 yearly mission-based compacts Special grants funding cycles	Individual university National Jurisdiction By type of intervention/program By target group
Outputs	University implementation of activities/programs to support post-graduate outcomes	The number and type of activities by type of program and target group (e.g. career counselling, internships)	These data represent what universities were able to achieve in practice. They can be compared to what was proposed and provide an aggregate view of target groups and type of strategies.	University reports to DIISRTE, yearly	Individual university National By type of activity (e.g. career counselling, internships) By target group
	Reach of the post-graduate activities/programs	The number and type of participants taking part in the programs/activities, by type of activity and target group	These data are essential for monitoring progress and setting realistic expectations – if students are not participating in the programs, then they are unlikely to have any effect on the desired outcomes.	University reports to DIISRTE, yearly	Individual university National By type of activity (e.g. career counselling, internships) By target group
		Number and proportion of students that used university careers services as part of their job search strategy	These two indicators provide a student-based measure of use of particular services – can be compared with university reports.	AGS	University National By equity group
		Number and proportion of students that attended careers fairs or information sessions as part of their job search strategy		AGS	University National By equity group

Type	Measure	Indicator	Justification	Data source(s)	Level at which indicator can be reported
Outcomes	Post-graduate employment	Proportion of students employed part-time or full-time 4 months after course completion	All four indicators are measures of the short-term and long-term returns to education. These are important markers not only of the "payoff" of university and individual student investment, but they also have symbolic functions as the visibility of the advantages of higher education attainment. Differences in these outcomes by equity group may suggest further intervention at the university level or may require further study.	AGS	University National By equity group
		Proportion of students employed in an area relevant to their course of study 4 months after course completion Denominator: number of students who completed 4 months prior		AGS	University National By equity group
	Post-graduate employment (continued)	Proportion of students employed part-time or full-time 3 years after course completion	All four indicators are measures of the short-term and long-term returns to education. These are important markers not only of the "payoff" of university and individual student investment, but they also have symbolic functions as the visibility of the advantages of higher education attainment. Differences in these outcomes by equity group may suggest further intervention at the university level or may require further study.	BGS	University National By equity group
		Proportion of students employed in an area relevant to their course of study 3 years after course completion		BGS	University National By equity group
	Post-graduate study	Proportion of students studying part-time or full-time 4 months after course completion	Although the primary focus of the equity policies is on undergraduate attainment, inequities persist at the graduate level as well. These indicators will measure the extent of the inequality as well as whether they decrease over time.	AGS	University National By equity group
		Proportion of students studying part-time or full-time 3 years after course completion		BGS	University National By equity group

Summary of the four-phases

Table 5 provides a summary of the number of indicators across type (input, output, outcome) for each of the four phases and in total.

Table 5: Coverage of proposed indicators by phase and type

Phase	Input indicators	Output Indicators	Outcome Indicators	Total
Pre-entry	2	4	7	13
Offers, acceptance and enrolment	3	2	8	13
University experience	2	10	6	18
Post-graduate outcomes	2	4	6	12
Total	**9**	**20**	**27**	**56**

A total of 56 indicators linked to the four phases are proposed, with a balance between the inputs (funding, plans), the outputs (what universities and the Government are providing and their reach), and outcomes that reflect the equity goals of increasing access, participation, and completion of university education for those from underrepresented groups.

Stage 2 detail: Proposed three-tier performance model

The National Aboriginal and Torres Strait Islander Health Performance Framework provided an organising context in which to consider health indicators for Indigenous people by developing three tiers of performance measurement. In that model the tiers were:

- Tier 1: health status and health outcomes
- Tier 2: determinants of health status
- Tier 3: health system performance

The AIHW was asked to produce a similar organising context for equity outcomes in higher education that would include precursors or predictors of higher education attainment and would group the inputs, outputs and outcomes identified from the four phases of the student education cycle. The three tiers created for the MFE (see Figure 1) are:

- Tier 1: Educational attainment and outcomes (23 output indicators)
  Contains measures related to access; offers, acceptances and enrolments; university experience; and postgraduate outcomes.

- Tier 2: Predictors of educational attainment (9 output indicators)
  Tier 2 contains measures of predictors of, and precursors to, higher education engagement and attainment (e.g., literacy and numeracy; intention to apply to attend university).

- Tier 3: Educational system performance (29 output indicators)
  Tier 3 contains measures of education system performance as it relates to access; offers, acceptances and enrolments; university experience; and postgraduate outcomes (e.g., data on equity-focussed interventions; use of university career services)

Figure 1: Proposed Performance Measurement Framework for Equity in Higher Education

TIER 1
Educational attainment and outcomes (measured for university, jurisdiction, population)

Pre-entry	Offers, acceptances, enrolments	University experience	Post graduate outcomes
1.01 Year 12 applications	1.04 Offers	1.12. Students who pass	Employment–any job
1.02 Applications	1.05 Offers by process	1.13 Re-enrolments within year	1.18 within 4 months
1.03 Application pathways	1.06 Rejected offers	1.14 completed courses in given year	1.20 within 3 years
	1.07 Deferments	1.15 completed courses in 5 year	Employment–job related to course
	1.08 Offers & enrolments	1.16 Satisfaction with quality of teaching	1.19 within 4 months
	1.09 Enrolments	1.17 Satisfaction with student support	1.21 within 3 years
	1.10 Low SES targets		Study after completion
	1.11 Other equity group targets		1.22 within 4 months
			1.23 within 3 years

TIER 2
Precursors of higher educational attainment

Pre-entry

2.01 Influence of university representatives

2.02 Intention to apply for university

2.03 Parental intent for students to apply for university

2.04 Expectation to complete university

2.05 Vulnerability across developmental domains

2.06 Literacy & numeracy

2.07 School attendance

2.08 YR 12 completions

2.09 ATAR scores

TIER 3
Educational system performance (measured by jurisdiction and university)

Pre-entry	Offers, acceptances and enrolments	University experience	Post graduate outcomes
3.01 Funding by program	3.03 Funding by program type	3.06 Funding by program type	3.08 Funding by program type
3.02 Equity-focussed interventions by funding source and equity group	3.04 Equity-focussed interventions by funding source and equity group	3.07 Equity-focussed interventions by funding source and equity group	3.09 Equity-focussed interventions by funding source and equity group
3.10 Partnership activities	3.05 Low SES target & other groups	3.16 support/participation activities	3.26 activities by type of program and target group
3.11 Participants in activities	3.14 Policies & practices	3.17 Student partaking in services	3.27 participants partaking in programs/activities
3.12 Information session attendance	3.15 Scholarships	3.18 Scholarships by source	3.28 use of university career services
3.13 Alternate pathway types		3.19 Award equity scholarships	3.29 attendance at career fairs or information sessions
		3.20 Austudy	
		3.21 ABSTUDY	
		3.22 Youth allowance	
		3.23 Part-time enrolments	
		3.24 External or multi-	

All indicators measured by Indigenous status, Socioeconomic disadvantage, regional /remoteness status, Disability, Non-English speaking back ground and Year