

FAMILY AND CHILD SERVICES — ASSESSMENT RESULTS

- 1 This Working Paper describes how the Commission estimates what each State would need to spend to provide the average level of family and child services to its residents. The development of the assessment method is discussed in Volume 4 of the 2004 Review Working Papers.

FAMILY AND CHILD SERVICES

- 2 All States provide family and child services. These services are provided to children and families, particularly those in crisis or in need of child care.
- 3 The Family and Child Services category covers expenses on administration, inspection, support and operation of welfare services provided to children, youth and families, including early intervention and residential services, child protection, out of home care and adoption services, and provision and subsidisation of child care services. More specifically, the category includes expenses on:
 - information, advice and referral in the areas of marriage and child/juvenile counselling, foster care and adoption services;
 - Supported Accommodation Assistance Program (SAAP) for youth;
 - protective investigation, protective supervision, statutory guardianship management and protective accommodation;
 - institutions for children and youth such as orphanages, children's boarding homes and hostels, residential nurseries, youth refuges, and juvenile hostels;
 - the assessment and evaluation of offenders or children/youth who are alleged to have committed an offence or have serious behavioural problems, through bodies that are not part of the judicial system; and
 - the operation or subsidy of long day care centres, family day care, occasional care/other centres in which little or no schooling is provided and outside school hours care.

- 4 State governments spent \$2.4 billion (\$114.77 per capita) on family and child services in 2006-07. No specific purpose payments from the Australian Government related to family and child services are included in category expenses.

WHY EXPENSES ON FAMILY AND CHILD SERVICES DIFFER

- 5 The amount spent in each State on family and child services per capita varies considerably. The Commission seeks to understand why these figures vary. If the sole source of variation is different government policies, then these differences have no impact on State GST revenue distribution. If the variation is due to circumstances beyond a State's control, then these differences are reflected in State GST revenue shares. Table 1 shows expenses on family and child services per capita for each State and the average overall.

Table 1 Family and Child Services, actual expenses per capita, 2008 Update

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
	\$pc	\$pc	\$pc	\$pc	\$pc	\$pc	\$pc	\$pc	\$pc
2002-03	86.49	85.36	52.52	70.09	85.92	114.59	144.83	176.20	80.62
2003-04	97.14	83.91	59.06	76.96	88.95	120.37	128.58	188.43	85.89
2004-05	90.60	90.42	98.12	83.01	106.07	136.25	234.37	208.02	97.06
2005-06	97.31	98.75	121.18	87.24	98.36	159.39	231.76	204.48	106.18
2006-07	101.19	99.15	134.08	98.75	150.06	178.10	180.13	201.98	114.77

Note: ACT expenses may include municipal expenses.

Source: CGC adjusted budget, derived from Government Finance Statistics (GFS) data collated by the ABS using CGC coding rules (and adjustments).

Box 1: The Commission's concept of average

The Australian average expense per capita is not a simple average of the experience of the eight States. It is calculated as the total expenses incurred by all States divided by the population of all States. This is a population weighted average. Population weighting gives equal weight to each Australian's experience. Since more Australians experience the New South Wales level of service, it carries more weight in the calculation of the average. 33 per cent of Australians reside in New South Wales and one per cent reside in the Northern Territory. Population weighting gives the experience of New South Wales (\$101.19 per capita in 2006-07) 33 times the weight of the experience of the Northern Territory (\$201.98 per capita). This approach means the average expense per capita is generally much closer to the New South Wales expense per capita than the Northern Territory expense per capita.

This concept of average also applies to the assessment of factors. If the Commission were trying to estimate the cost of providing services to Indigenous people living in remote areas, it would give most weight to the Northern Territory's experience (38 per cent of remote Indigenous people live in the Territory) and least to Tasmania (less than 0.2 per cent), Victoria (less than 0.1 per cent) and the ACT (0 per cent).

- 6 The drivers of State expenses per capita are likely to include influences such as:
- the unit cost of resources provided to children/youth;
 - the number of resources provided to each child/youth; and

- the number of children/youth in State populations.

7 Table 2 shows some measures of the target population for family and child services and the cost of services per capita and per target population.

Table 2 Category expenses and general indicators of the target population, 2005-06

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
(a) General indicators									
Expenses on child and youth support services (\$m)	624.4	501.0	459.9	172.1	146.9	76.2	73.4	38.5	2092.5
Expenses on child care services (\$m)	36.2	1.7	30.7	5.8	6.6	1.6	3.6	4.2	90.3
Population aged 0-17 ('000)	1610	1181	1007	498	350	117.4	76.4	61.2	4900.9
Population aged 0-12 ('000)	1149	839	717	352	246	82.8	53.8	44.8	3484.1
Total population ('000)	6 817	5 128	4 092	2 059	1 568	490	334	211	20 699
(b) Ratios									
Child and youth support expense per capita (\$)	92	98	112	84	94	156	220	183	101
Child and youth support expense/population aged 0-17 (\$)	388	424	457	345	420	650	962	630	427
Population 0-17 year olds per capita (%)	23.6	23.0	24.6	24.2	22.3	24.0	22.9	29.0	23.7
Child care expense per capita (\$)	5.3	0.3	7.5	2.8	4.2	3.3	10.7	19.7	4.4
Child care expense per child aged 0-12 (\$)	31.5	2.1	42.8	16.4	26.7	19.6	66.2	92.5	25.9
Children 0-12 per capita (%)	16.8	16.4	17.5	17.1	15.7	16.9	16.1	21.3	16.8
(c) Difference between State and average ratios									
Child and youth support expense per capita (\$)	-9	-3	11	-18	-7	55	119	82	0
Child and youth support expense per child aged 0-17 (\$)	-39	-3	30	-82	-7	223	535	203	0
Population 0-17 year olds per capita (%)	-0.1	-0.6	0.9	0.5	-1.4	0.3	-0.8	5.4	0.0
Child care expense per capita (\$)	0.9	-4.0	3.1	-1.6	-0.2	-1.0	6.3	15.3	0.0
Child care expense per child aged 0-12 (\$)	5.6	-23.9	16.9	-9.5	0.8	-6.3	40.3	66.6	0.0
Children 0-12 per capita (%)	0.0	-0.5	0.7	0.3	-1.1	0.1	-0.7	4.5	0.0

Note: ACT expenses may include municipal expenses.

Source: Recurrent expenses on child care services data obtained from Productivity Commission, Report on Government Services 2007, Tables 14A1.29, 14A.38, 14A.47, 14A.56, 14A.65, 14A.74, 14A.83, 14A.92; expenses on child and youth support services obtained as balance of category expenses; category expense data come from the CGC adjusted budget, derived from Government Finance Statistics data provided by the ABS; population data are estimated resident population, derived from ABS statistics.

8 States' expenses per capita are affected mainly by:

- the number of service users; and
- the number of service users in special needs groups.

9 The Commission seeks measures of need that are not influenced by State policies.

Number of service users

10 The proportion of people in target populations and the proportion of those using services vary between the States. Table 3 provides information on some of the characteristics of each State's family and child welfare sector.

Table 3 Family and child welfare sector characteristics, 2005-06

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT
Child care								
Children 0-12 in State-funded child care ^(a)	104 295	1 599	2 020	na	2 720	779	na	na
Population aged 0-12 ('000) ^(b)	1 148.7	838.6	717.2	352.1	246.1	82.8	53.8	44.8
Children & youth support								
Children 0-17 in substantiation for abuse and neglect ^(c)	12 658	7 288	10 177	926	1 457	559	864	464
Non-Indig. children 0-17 on care and protection orders ^{(c)(d)}	6 804	5 244	4 779	1 248	1 293	708	458	134
Indigenous children 0-17 on care and protection orders ^{(c)(d)}	2 409	740	1 667	798	378	125	100	303
Children 0-17 in out of home care ^(c)	9 896	4 794	5 876	1 968	1 497	683	388	352
Population aged 0-17 ('000)	1 569.2	1 157.6	981.8	486.8	342.7	114.3	75.4	60.6
Non-Indigenous population 0-17 ('000)	1 507.4	1 144.4	917.7	455.1	331.8	106.9	73.7	34.1
Indigenous population 0-17 ('000)	61.8	13.2	64.2	31.7	10.9	7.4	1.7	26.5
Low income population 0-17 ('000)	379.1	263.5	223.4	106.6	86.4	31.5	10.4	19.2

(a) NSW data are not comparable with data for other States as they include children using preschool services.

(b) Estimated resident population.

(c) State data are not strictly comparable.

(d) New South Wales data do not include supervisory orders.

Source: Children attending State funded childcare data are from Productivity Commission, Report on Government Services, 2007; population data for children & youth support are from the ABS 2006 Census; child protection service users data are from Australian Institute of Health and Welfare, Child protection, Australia, 2005-06.

Number of service users in special needs groups

11 Certain groups of family and child service users have special needs. In its 2007 Report on Government Services, the Productivity Commission identified the following special needs groups for child care services:

- Indigenous children;
- children from a non-English speaking background (NESB);

- children from low income families;
- children with a disability; and
- children in regional and remote areas.

12 It identified the following special needs groups for child protection services:

- Indigenous children; and
- children from low income families.

13 Table 4 shows State shares of target populations and service users.

Table 4 Family and child welfare sector, shares of indicators, 2005-06

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT
	%	%	%	%	%	%	%	%
Child care								
Children 0-12 in State-funded child care ^(a)	93.6	1.4	1.8	na	2.4	0.7	na	na
Population aged 0-12 ^(b)	33.0	24.1	20.6	10.1	7.1	2.4	1.5	1.3
Children & youth support								
Children 0-17 in substantiation for abuse and neglect ^(c)	36.8	21.2	29.6	2.7	4.2	1.6	2.5	1.3
Non-Indig. children 0-17 on care and protection orders ^{(c),(d)}	32.9	25.4	23.1	6.0	6.3	3.4	2.2	0.6
Indigenous children 0-17 on care and protection orders ^{(c),(d)}	36.9	11.3	25.6	12.2	5.8	1.9	1.5	4.6
Children 0-17 in out of home care ^(c)	38.9	18.8	23.1	7.7	5.9	2.7	1.5	1.4
Population aged 0-17	32.8	24.2	20.5	10.2	7.2	2.4	1.6	1.3
Non-Indigenous population 0-17	33.0	25.0	20.1	10.0	7.3	2.3	1.6	0.7
Indigenous population 0-17	28.4	6.1	29.5	14.6	5.0	3.4	0.8	12.2
Low income population 0-17	33.8	23.5	19.9	9.5	7.7	2.8	0.9	1.7

Source: See Table 3.

14 The proportion of users in each special needs group is another example of circumstances which affect the cost of providing family and child services and which are beyond the direct control of an individual State government.

ASSESSING STATES' COSTS OF PROVIDING FAMILY AND CHILD SERVICES

The equalisation task

15 The Commission aims to identify why it costs some States more to provide family and child services and then, using this information, to estimate what it would cost each State to provide

family and child services using the average policy and practice of all States. This estimate is called a State's *assessed expense*.

- 16 The process the Commission follows is twofold. First, it starts with the average expense which captures the average policies, efficiency and circumstances of all States. Second, it attempts to quantify how a State varies from the average in some underlying characteristics (for example, the proportion of its population who are aged 0 to 17) and what effect such variations could have on its total expenses. Bringing them together shows how much a State could be expected to vary from the average, solely because of its innate characteristics. The resultant estimate is its assessed expense. This section discusses how the Commission identifies these characteristics; the following sections discuss how it measures them.
- 17 The Commission identifies the major influences that cause States to have different expenses per capita and estimates their financial impact on either:
- assessed service use; or
 - assessed unit costs.

Assessed service use

- 18 For family and child services, the influences which affect assessed service use are the proportion of children:
- aged 0 to 5;
 - aged 6 to 12;
 - aged 0 to 14 from low income families;
 - aged 0 to 14 from high income families;
 - aged 15 to 17 from low income families;
 - aged 15 to 17 from high income families;
 - aged 0 to 14 and Indigenous;
 - aged 0 to 14 and non-Indigenous;
 - aged 15 to 17 and Indigenous; and
 - aged 15 to 17 and non-Indigenous.

Assessed unit costs

- 19 For family and child services, the influences which affect assessed unit costs are:
- the proportion of service users in certain special needs groups which cost more to service; for example Indigenous users in remote areas, and users with low English fluency.
 - location of services. Service providers located in remote areas have higher costs associated with their location (travel, freight, staff relocation etc);
 - isolation from sources of supply. Where supplies and other resources must be brought from interstate, costs are higher;

- the unavoidable overheads associated with setting up a family and child services welfare system;
- the unit cost of inputs. States face differing costs in relation to the price of labour, accommodation, consumables and electricity; and
- cross-border use of services. The ACT faces additional costs in providing services to residents of New South Wales.

20 While some of these influences, such as wage levels and electricity costs, may be partially affected by government policies, the Commission attempts to take account of only that part of the influence which is beyond the control of individual State governments.

OVERVIEW OF THE METHOD FOR DETERMINING ASSESSED EXPENSES

21 Box 2 provides a brief step by step overview of the framework the Commission uses to determine each States' assessed expenses for family and child services.

DERIVING COMPONENTS AND COMPONENT WEIGHTS

22 The Commission examines the service to decide whether parts of the total expense are affected by different influences. If the differences are material, the expense is divided into component parts to ensure that the various influences are accurately matched with the expenses they affect. The different expense types identified are referred to as *components*. The proportion of total expense attributable to a particular component is referred to as the *component weight*.

23 The Commission identified four components for family and child services and estimated the proportion of expenses that each cost component contributed to total family and child services costs. The components and component weights are presented in Table 5.

Box 2: Assessment framework**Step 1: Derive the average expense per capita**

This is done by dividing the total expenses incurred by all States by the population of all States. This figure captures the average financial impact of the policies, practices and particular State circumstances which impact on the cost of delivering the service across the nation.

Step 2: Identify different types of expenses

The Commission examines the service to determine whether parts of the total expense are affected by different influences. If the differences are material, the expense is divided into component parts to ensure that the various influences are accurately matched with the expenses they affect. The different expense types identified are referred to as components. To identify components, the Commission analyses information and data on the nature of the service (that is, what States do and how they do it), States' policies concerning the service and submissions. The proportion of total expense attributable to a particular component is referred to as the component weight. The Commission uses ABS GFS data, State public accounts, annual reports and other data to estimate these proportions.

Step 3: Identify the influences for each component

The Commission identifies the influences that affect each component and the extent to which they are beyond the control of individual State governments. To identify influences, the Commission analyses information and data on the nature of the service (that is, what States do and how they do it), States' policies concerning the service, submissions and other publications.

Step 4: Measure the size of each influence

The Commission estimates the relative financial impact of each influence on each State's cost of providing the service, but only to the extent it is beyond the control of individual State governments. The relative impact is measured by relating the State's experience to the average experience. The relative impacts are presented as factors. A factor measures the percentage increase (or decrease) that the influence has on a State's cost of providing the service. There is at least one factor assessment for each component. In most cases there is more than one.

Step 5: Derive component factors

The factors calculated for each cost component are combined together to derive a component factor. If the Commission considers that one factor compounds with another, it multiplies them. If the Commission considers that two factors are independent of one another, it adds them.

Step 6: Derive category factors

The component factors are weighted to reflect the importance of the component in the category. This is done by multiplying each component factor by its component weight. The category factor is calculated by adding the weighted component factors together. The category factor represents the Commission's estimate of the combined financial impact of all the influences on a State's cost of providing the service.

Step 7: Derive assessed expense per capita

Each State's assessed expense per capita is calculated by applying its category factor to the average expense per capita. A State's assessed expense per capita is the Commission's estimate of how much it would cost the State (per capita) to provide the average level of service.

The difference between a State's assessed expense per capita and the average expense per capita is a measure of the financial impact of circumstances beyond its control. The difference between its assessed expense per capita and its actual expense per capita is a measure of the financial impact of circumstances within its control.

Table 5 Components and component weights, 2006-07

Component	Component expenses	Component weight
	\$m	%
Fixed costs	13.86	0.58
Child care	107.01	4.47
Child and youth support	2 271.07	94.87
Isolation	2.00	0.08
Total	2 393.95	100.00

Source: Assessment System, U2008 GST/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/Components and Component Weights

- 24 The component weights for fixed costs and isolation were calculated directly. For 2006-07, fixed costs were estimated at \$13.86 million and isolation costs at \$2.00 million.¹ The corresponding component weights are calculated by dividing these amounts by total category expenses. The other component weights were calculated using ABS GFS data.
- 25 The Commission identifies the influences affecting each component. They are, in the Commission's assessment, the reasons why States spend more (or less) than the average expense per capita to provide the average level of service. The Commission presents these influences as factors.

Box 3: Commission factors

A factor is the Commission's estimate of the relative financial impact a particular influence has on a State's cost of providing a service. Factors are only calculated for the part of the influence which is beyond the control of individual State governments.

A factor value of one means the Commission considers the State could provide the average level of service by spending the average expense per capita. A factor value of more than one means the Commission considers the State will have to spend more than the average expense per capita to provide the average level of service. A factor value of less than one means the Commission considers the State can provide the average level of service by spending less than the average expense per capita.

- 26 Table 6 lists each component and associated factors for family and child services.
- 27 Explanations of the reasoning behind each factor assessment in the Family and Child Services category and the method of assessment are presented below.

¹ The Administrative Scale and Isolation sections of these Working Papers describe how the Commission determines the size of the administrative scale and isolation costs.

Table 6 Components and factors, 2008 Update

Component and 2006-07 component weights	Factors	Influence measured by factor
Fixed costs (0.58%)	Administrative scale	Recognises the unavoidable costs each State incurs to provide the policy and administrative infrastructure necessary to provide the service, regardless of the size of the task.
	Fixed costs input costs	Recognises the differences between States in the prices of head office labour, accommodation, and electricity used in providing services.
Child care services (4.47%)	Socio-demographic composition (SDC)	Recognises that the use of child care services is influenced by differences in numbers of young children between States.
	Dispersion	Recognises the differences in per capita costs of service provision associated with the spread of population.
	Input costs	Recognises the differences between States in the prices of labour, accommodation, and electricity used in providing services.
	Cross-border	Recognises the additional costs faced by the ACT in providing services to residents of New South Wales.
Child and youth support services (94.87%)	Socio-demographic composition (SDC)	Recognises that the use and cost of providing child and youth support services are influenced by a State's population characteristics (such as age, Indigeneity, income, English fluency and remoteness).
	Dispersion	Recognises the differences in per capita costs of service provision associated with the spread of population.
	Input costs	Recognises the differences between States in the prices of labour, accommodation, and electricity used in providing services.
Isolation (0.08%)	Isolation	Recognises the additional costs incurred by the States, attributable to the distance of the State from other State capitals and sources of supply.

DERIVING THE FIXED COST COMPONENT FACTOR

28 The Commission considers the amount of fixed costs required to be spent by each State is influenced by administrative scale and differences in the price of labour, accommodation and electricity.

Administrative scale factor

29 The administrative scale factor is assessed to recognise the unavoidable cost each State incurs to provide central administrative services to plan, regulate, and subsidise family and child services, regardless of the size of its population. For all State-type services, each State is assessed to require a similar level of administration expense, around \$184.0 million in 2006-07. The Northern Territory required \$52 million more, because its high proportion of Indigenous people necessitates dual planning and administrative structures. The ACT required \$7.7 million less,

because the Commission considers it has zero or very low needs in certain categories (for example, Services to Indigenous Communities).

- 30 The disabilities for administrative scale factors are assessed by a common method. The method is discussed in Volume 7 of the 2004 Review Working Papers.
- 31 For 2006-07, the levels of unavoidable fixed cost assessed for this category was \$1.70 million for each State. A further \$0.29 million was assessed for the Northern Territory because its high proportion of Indigenous service users necessitates dual planning and administrative structures. For this category, the ACT was assessed to have the same needs as the six States.
- 32 Table 7 shows the amount assessed for each State and the per capita equivalent. It also shows the administrative scale factor which is calculated by dividing each State's per capita amount by the average per capita amount.

Table 7 Derivation of administrative scale factor, 2006-07

		NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
Fixed cost amount	\$m	1.697	1.697	1.697	1.697	1.697	1.697	1.697	1.697	13.574
Dual policy amount	\$m	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.288	0.288
Fixed costs	\$m	1.697	1.697	1.697	1.697	1.697	1.697	1.697	1.985	13.862
Population	m	6.856	5.168	4.136	2.082	1.577	0.492	0.337	0.213	20.859
Fixed costs per capita	\$pc	0.25	0.33	0.41	0.81	1.08	3.45	5.04	9.33	0.66
Factor		0.37241	0.49408	0.61736	1.22628	1.61936	5.19306	7.58308	14.03500	1.00000

Source: Assessment System, U2008 GST/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/Administrative scale fixed costs per capita

- 33 The administrative scale factor is revised annually by adjusting the unavoidable fixed cost to reflect changes in the wage cost index (80 per cent weight) and consumer price index (20 per cent weight).

Fixed costs input costs factor

- 34 The input costs factor is assessed to recognise interstate differences, beyond the control of States, in the price of labour, accommodation and electricity used in providing administrative services.
- 35 The disabilities for the input costs factors are assessed by a common method. The method is discussed in Volume 7 of the 2004 Review Working Papers.
- 36 The input costs factor depends on the proportion of fixed costs expenses deemed to relate to wages, accommodation expenses and electricity expenses. For this component, these are 80 per cent for wages, 2 per cent for accommodations and 0.5 per cent for electricity. Table 8 shows:
- the price differentials for labour (wages), accommodation and electricity assessed by the Commission. For example, average wages in New South Wales were, for reasons beyond its control, 3.0 per cent higher than average in 2006-07;

- the proportion of fixed costs expenses which relate to wages, accommodation and electricity expenses;
- a total price differential — obtained by weighting each price differential by the proportion of the fixed costs expenses it influences; and
- the 2006-07 fixed costs input costs factor — which is one plus the total price differential.

Table 8 Derivation of fixed costs input costs factor, 2006-07

	Prop'n	NSW	Vic	Qld	WA	SA	Tas	ACT	NT
	%	%	%	%	%	%	%	%	%
Wages	80.0	3.0	-0.5	-2.7	-1.4	-2.2	-4.1	2.5	2.5
Accommodation	2.0	5.0	-19.6	29.4	13.2	-34.2	-41.6	-1.1	-35.8
Electricity	0.5	-1.9	-1.9	-1.9	13.6	2.6	-40.3	-1.9	90.1
Balance of expenses	17.5	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total price ^(a)		2.5	-0.8	-1.6	-0.8	-2.4	-4.3	1.9	1.8
Factor		1.02528	0.99212	0.98387	0.99199	0.97579	0.95664	1.01939	1.01769

(a) May not add due to rounding.

Source: Assessment System, U2008 GST/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/Derivation of Fixed Costs Input Costs Factor

Box 4: Weighting factors

The Commission weights a factor when the factor is to be applied to all of a component expense but it only affects part of the component expense.

As an example, the fixed costs input costs factor is to be applied to all of the administrative scale expenses, but it only affects the wages (80 per cent), accommodation (2 per cent) and electricity (0.5 per cent) parts of these expenses. So, the Commission weights each sub-factor according to the share of expenses it affects.

The formula is:

$$\text{Weighted factor} = \sum_i \text{Weight}_i * \text{sub-factor}_i + (100\% - \sum_i \text{Weight}_i) * \text{EPC factor}$$

Where: i = the number of sub-factors, e.g. wages, accommodation and electricity

Weight_i = the share of expenses affected by the relevant sub-factor

$(100\% - \sum_i \text{Weight}_i)$ = the share of expenses not affected by any of the sub-factors.

For the fixed costs input costs factor, the formula is:

$$\text{Weighted factor} = 80\% * \text{wages sub-factor} + 2\% * \text{accommodation sub-factor} + 0.5\% * \text{electricity sub-factor} + 17.5\% * \text{EPC factor}$$

Weighting factors according to the proportion of expenses they affect is important. Weighting factors allows the Commission to combine them. After weighting, a percentage increase in one factor has the same impact on expenses as the same percentage increase in any other factor.

37 The fixed costs input costs factor is revised annually.

Fixed costs component factor

38 The fixed costs component factor is calculated using the formula:

$$\frac{\text{fixed costs}}{\text{component factor}} = [\text{administrative scale} * \text{fixed costs input costs}]$$

39 The Commission combines these factors multiplicatively because it recognises that State costs for administrative services will vary due to differences in the price of inputs. For example, Table 8 shows price differences added 2.5 per cent to New South Wales' costs in 2006-07, so it cost New South Wales 2.5 per cent more than its administrative scale assessment of \$1.70 million to provide family and child services.

40 Table 9 shows the derivation of the component factor. It shows that it is the same as a component factor obtained by multiplying the administrative scale and fixed costs input costs factor.

41 The component factor is calculated by:

- estimating the impact of differences in the unit cost of inputs between States on the fixed costs assessed in Table 7;
- adding this impact to States' fixed costs;
- dividing each State's total fixed costs by its population; and
- calculating the component factor by dividing each State's per capita figure by the average per capita figure.

Table 9 Family and Child Services, calculation of fixed costs component factor, 2006-07

		NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
A. Fixed costs amount (from Table 7)										
Amount	\$m	1.697	1.697	1.697	1.697	1.697	1.697	1.697	1.985	13.862
B. Differences in price of inputs (from Table 8)										
Difference	%	2.5	-0.8	-1.6	-0.8	-2.4	-4.3	1.9	1.8	0.0
C. Impact of price differences (A * B)										
Amount	\$m	0.043	-0.013	-0.027	-0.014	-0.041	-0.074	0.033	0.035	0.000
D. Total fixed costs (A + C)										
Amount	\$m	1.740	1.683	1.669	1.683	1.656	1.623	1.730	2.020	13.862
Population	m	6.856	5.168	4.136	2.082	1.577	0.492	0.337	0.213	20.859
E. Total fixed costs per capita										
Expenses per capita	\$pc	0.25374	0.32576	0.40365	0.80840	1.05011	3.30147	5.13713	9.49207	0.66456
F. Factor (E / E _{Aust})										
Factor		0.38182	0.49019	0.60740	1.21645	1.58015	4.96790	7.73013	14.28324	1.00000

Source: Assessment System, U2008 GST/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/Derivation of Fixed Costs Component Factor

DERIVING THE CHILD CARE SERVICES COMPONENT FACTOR

- 42 The amount of child care services costs required to be spent by each State is considered by the Commission to be influenced by the number of service users in its population — a use-weighted population calculation — and differences in:
- the price of labour, accommodation and electricity; and
 - costs associated with the geographical dispersion of a State’s population.

Socio-demographic composition factor

- 43 A socio-demographic composition (SDC) factor is assessed to take account of State differences in the use of services due to differing numbers of service users in State populations and differences in the costs of delivering services to different population sub-groups. The use of services is measured by service use rates. For each population sub-group, Australian average use rates are calculated. These are then applied to the State sub-group populations, which are then added to derive a use-weighted population (see Box 5).

Box 5: Socio-demographic composition factor

Step 1: Obtain State-funded child care user data

State-funded child care data are obtained disaggregated into two age groups — 0 to 5 and 6 to 12 years.

Step 2: Calculate Australian use rates for State-funded child care services

Use rates for State-funded child care services are calculated for each age group by dividing the number of users of that age by the estimated resident population of that age.

Step 3: Calculate the factor

A weighted population is calculated for each age group by multiplying the use weights and States unweighted populations. Total State weighted populations are calculated by adding across both age groups. Ratios are calculated for each State and Australia by dividing its weighted population by its total population. Factors are calculated for each State by dividing its ratio by the Australian ratio.

Use of State-funded child care services

- 44 Actual State-funded child care use data are available disaggregated by age, and these are used in the assessment. There are different kinds of child care available for children aged 0 to 5 and 6 to 12 (the latter are users of after school care), so these two age groups are used in the assessment.

Factor calculation

- 45 Table 10 shows the derivation of the child care services socio-demographic composition factor for 2006-07. The number of notional users is the use-weighted population.

Table 10 Derivation of child care services socio-demographic composition factor, 2006-07

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
A. Notional users (no.)	36 653	26 877	22 996	11 339	7 719	2 598	1 757	1 475	111 413
B. Mean resident population ('000)	6 856	5 168	4 136	2 082	1 577	492	337	213	20 859
C. Notional users per capita (A/B)	0.00535	0.00520	0.00556	0.00545	0.00490	0.00528	0.00522	0.00693	0.00534
D. Factor (C/C_{Aus})	1.00092	0.97375	1.04102	1.01963	0.91665	0.98928	0.97687	1.29749	1.00000
E. Scaled factor^(a)	1.00092	0.97375	1.04102	1.01963	0.91665	0.98928	0.97687	1.29749	1.00000

(a) This is the factor after it has been scaled to ensure total assessed expenses equals average expenses (see Box 6).
Source: Assessment System, U2008 GST/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/Derivation of Child Care Services SDC Factor

Box 6: Scaling factors

Some factor assessments cause total assessed expenses to move away from average expenses. To prevent gaps opening up in the assessments, the Commission scales these factors to ensure total assessed expenses equals average expenses. It also scales component factors.

The scaling procedure is to:

- apply the factor to mean resident population;
- calculate the total weighted population by aggregating across States;
- divide total mean resident population by the total weighted population; and
- scale each State's factor using this ratio.

46 The socio-demographic composition factors are revised annually to allow for changes in service use and State populations. Table 11 shows the assessed factors for the 2008 Update.

Table 11 Family and Child Services, child care component, socio-demographic composition factors, 2008 Update

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
2002	1.00178	0.97428	1.04054	1.00862	0.92495	0.99840	0.97783	1.33674	1.00000
2003	1.00304	0.97552	1.03887	1.00779	0.92170	0.99417	0.97256	1.33624	1.00000
2004	1.00311	0.97560	1.04257	1.00580	0.91779	0.98484	0.96627	1.32859	1.00000
2005	1.00394	0.97331	1.04371	1.01053	0.91412	0.98215	0.96206	1.31644	1.00000
2006	1.00092	0.97375	1.04102	1.01963	0.91665	0.98928	0.97687	1.29749	1.00000

Source: Assessment System, U2008 GST/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/Child Care SDC factors

Child care input costs factor

- 47 The input costs factor is assessed to recognise interstate differences, beyond the control of States, in the price of labour, accommodation and electricity used in providing services for central and regional administrative services. The disabilities for the input costs factors are assessed by a common method. The method is discussed in Volume 7 of the 2004 Review Working Papers.
- 48 The input costs factor depends on the proportion of child care expenses deemed to relate to wages, accommodation expenses and electricity expenses. For this component, these are 70 per cent for wages, 2 per cent for accommodation and 0.5 per cent for electricity. Table 12 shows:
- the price differentials for labour (wages), accommodation and electricity assessed by the Commission;
 - the proportion of child care expenses which relate to wages, accommodation and electricity expenses;
 - a total price differential — obtained by weighting each price differential by the proportion of child care expenses it influences; and
 - the 2006-07 child care input costs factor — which is one plus the total price differential.

Table 12 Derivation of child care input costs factor, 2006-07

	Prop'n	NSW	Vic	Qld	WA	SA	Tas	ACT	NT
	%	%	%	%	%	%	%	%	%
Wages	70.0	3.0	-0.5	-2.7	-1.4	-2.2	-4.1	2.5	2.5
Accommodation	2.0	5.0	-19.6	29.4	13.2	-34.2	-41.6	-1.1	-35.8
Electricity	0.5	-1.9	-1.9	-1.9	13.6	2.6	-40.3	-1.9	90.1
Balance of expenses	27.5	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total price ^(a)		2.2	-0.7	-1.3	-0.7	-2.2	-3.9	1.7	1.5
Factor		1.02223	0.99260	0.98661	0.99340	0.97798	0.96077	1.01693	1.01515

(a) May not add due to rounding.

Source: Assessment System, U2008 GST/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/Derivation of Combined Input Costs and Dispersion Factor

- 49 The input costs factor is revised annually to allow for changes in wages, rents and electricity prices.

Dispersion factor

- 50 The dispersion factor is assessed to recognise differences in the per capita costs of service provision associated with the geographic dispersion of population. The dispersion factor reflects the combined differences in State expenses associated with telecommunication, freight, travel and other costs associated with providing services to dispersed localities. The disabilities

for the dispersion factors are assessed by a common method. The method is discussed in Volume 7 of the 2004 Review Working Papers.

51 Table 13 shows:

- the price differentials for each of the 11 types of expenses covered by the dispersion factor;
- the proportion of child care expenses which relate to each type of expense;
- a total price differential — obtained by weighting each price differential by the proportion of child care expenses it influences; and
- the 2006-07 child care dispersion factor — which is one plus the total price differential.

Table 13 Derivation of dispersion factor, 2006-07

Expense type	Prop'n	NSW	Vic	Qld	WA	SA	Tas	ACT	NT
	%	%	%	%	%	%	%	%	%
Voice technology	0.90	-1.3	-13.8	16.6	12.2	-8.9	-4.5	-61.3	138.7
Non-voice technology	0.10	-0.2	0.0	0.0	0.3	0.0	-0.1	0.5	0.7
General freight	0.31	3.8	-7.8	25.8	-0.9	-46.1	-5.1	-92.1	115.9
Air travel	0.17	10.0	-85.3	135.9	-9.8	-51.1	-99.6	-100.0	138.5
Inter-regional travel	0.28	8.1	-11.8	-10.3	-8.7	16.0	100.2	-85.6	68.6
Local travel	1.74	-3.0	-5.2	-3.0	22.0	-12.8	-32.7	-46.0	331.8
Remote removals	0.00	-56.4	-96.9	89.9	220.4	-20.7	-65.2	-100.0	964.6
Locality allowances	0.08	-58.5	-97.6	92.0	207.7	-41.9	-89.2	-100.0	1360.7
Repairs and maintenance	0.07	-69.7	-95.5	28.6	184.7	47.0	-38.1	-100.0	2281.6
Technology related repairs	0.00	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Technology related support	0.00	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Sub-total ^(a)	3.65	-0.1	-0.6	0.5	0.7	-0.5	-0.6	-2.2	10.5
Balance	96.35								
Total price	100.00	-0.1	-0.6	0.5	0.7	-0.5	-0.6	-2.2	10.5
Factor ^(b)		0.99879	0.99425	1.00461	1.00725	0.99499	0.99372	0.97792	1.10467

(a) May not add due to rounding.

(b) This is the component factor after it has been scaled to ensure total assessed expenses equals average expenses (see Box 6).

Source: Assessment System, U2008 GST/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/Derivation of Combined Input Costs and Dispersion Factor

52 The dispersion factor is only revised in a review.

53 Table 14 shows the derivation of a combined input costs and dispersion factor. It recognises that the two factors influence different types of expenses and so do not interact. Consequently, these factors can be combined by addition.

Table 14 Derivation of combined input costs and dispersion factor, 2006-07

Expense type	Prop'n	NSW	Vic	Qld	WA	SA	Tas	ACT	NT
	%	%	%	%	%	%	%	%	%
Input costs sub-total	72.5	2.2	-0.7	-1.3	-0.7	-2.2	-3.9	1.7	1.5
Dispersion sub-total	3.65	-0.1	-0.6	0.5	0.7	-0.5	-0.6	-2.2	10.5
Balance	23.8	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total price ^(a)		2.1	-1.3	-0.9	0.1	-2.7	-4.5	-0.5	12.0
Factor		1.02115	0.98699	0.99135	1.00079	0.97310	0.95462	0.99498	1.11996

(a) May not add due to rounding.

Source: Assessment System, U2008 GST/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/Derivation of Combined Input Costs and Dispersion Factor

Cross-border factor

- 54 The cross-border factor is assessed to recognise the additional costs to the ACT of providing services to New South Wales residents. The cross-border factor is assessed by a common method, discussed in Volume 7 of the 2004 Review Working Papers.
- 55 The general model divided south-eastern New South Wales into two catchments. Group 1 comprised Queanbeyan, Yass, Yarrowlunla and Gunning. Group 2 comprised Bega Valley, Bombala, Boorowa, Cooma-Monaro, Crookwell, Eurobodalla, Goulburn, Harden, Mulwaree, Snowy River, Tallanganda and Young. The general model presumed a specified percentage of the population in each group used ACT services. The percentage differed for different services. In the child care services component, the cross-border factor takes into account 50 per cent of the population aged 0-12 in Group 1 and 20 per cent of the population aged 0-12 in Group 2.
- 56 Since the 2007 Update the New South Wales Government changed the Local Government Area (LGA) boundaries. For this Update, the ABS made estimated resident population figures available for the newly defined areas and provided comparable figures back to 2001. Group 1 comprised population of Queanbeyan City, Yass Valley, Palerang, Part A and one third of Upper Lachlan. Group 2 comprised Bega Valley, Bombala, Booroowa, Cooma- Monaro, Eurobodalla, Goulburn- Mulwaree, two- thirds of Upper Lachlan, Harden, Palerang Part B, Snowy River and Young. Table 15 shows the derivation of the cross-border factor for 2006-07.

Table 15 Derivation of child care services cross-border factor, 2006-07

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aus
A. Total Population 0 to 12 (no.)	1 149 069	0	0	0	0	0	54 449	0	0
B. Population 0 to 12 NSW Group 1 LGAs (no.)	11 957	0	0	0	0	0	0	0	0
C. Population 0 to 12 NSW Group 2 LGAs (no.)	23 536	0	0	0	0	0	0	0	0
D. Relevant population in NSW Group 1 and 2 LGAs (B*0.5+C*0.20) (no.)	10 686	0	0	0	0	0	0	0	0
E. Adjusted population (NSW = A-D, ACT = A+D) (no.)	1 138 383	0	0	0	0	0	65 135	0	0
F. Factor (E/A)	0.99070	1.00000	1.00000	1.00000	1.00000	1.00000	1.19625	1.00000	1.00000

Source: Assessment System, U2008 GST/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/Derivation of Cross-border factor

57 The cross-border factor is revised annually to allow for changes in estimated resident population.

Child care services component factor

58 The child care services component factor represents the combined effects of the influences on use and unit costs of child care services that are not affected by State policies. The socio-demographic composition factor captures the assessed service use by each State. The Commission recognises that the costs of providing these services will vary between States because:

- the unit costs of inputs vary between States; and
- the unit costs of service provision associated with the geographic dispersion of population vary between States.

59 The Commission combines these influences by:

- using notional users from Table 10 as an indicator of assessed service use;
- adjusting the assessed service use for differences in the costs of providing services to residents of other States;
- adjusting the assessed service use for the combined effect of differentials in the price of labour, accommodation and electricity and the costs of service provision associated with the geographic dispersion of population;
- dividing each State's cost and price weighted notional users by its population; and

- calculating the component factor by dividing each State's per capita figure by the average per capita figure.

60 Table 16 shows the derivation of the child care services component factor for 2006-07. The calculation, based on notional users, can be compared with that derived using the formula:

$$\text{Child care services component factor} = \frac{\text{[socio-demographic composition * cross-border * (dispersion + input costs - 1)]}}{\text{[socio-demographic composition * cross-border * (dispersion + input costs - 1)]}}$$

61 In this latter approach, the dispersion and input costs factors are added and then combined with the socio-demographic composition and cross-border factors by multiplication.

Table 16 Calculation of child care services component factor, 2006-07

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
A. Assessed service use (notional users from Table 10)									
Notional users (no.)	36 653	26 877	22 996	11 339	7 719	2 598	1 757	1 475	111 413
Differences in prices and unit costs									
B. Cross-border (%)	-0.9	0.0	0.0	0.0	0.0	0.0	19.6	0.0	0.0
C. Input Costs and Dispersion (%)	2.1	-1.3	-0.9	0.1	-2.7	-4.6	-0.5	12.0	0.0
D. Price of services (B*C)^(a)									
Price difference (%)	1.2	-1.3	-0.9	0.1	-2.7	-4.6	19.0	12.0	0.0
E. Impact of differences in prices (A*D)									
Users (no.)	423	- 353	- 202	7	- 209	- 118	334	177	58
F. Notional users (A+E)									
Users (no.)	37 075	26 523	22 794	11 347	7 511	2 480	2 091	1 651	111 471
G. Population									
Population ('000)	6 856	5 168	4 136	2 082	1 577	492	337	213	20 859
H. Notional users per capita (F/G)									
Users per capita (no.)	0.00541	0.00513	0.00551	0.00545	0.00476	0.00504	0.00621	0.00776	0.00534
I. Factor (H/HAust)									
Factor ^(b)	1.01193	0.96045	1.03133	1.01976	0.89141	0.94376	1.16195	1.45218	1.00000

(a) Care is required when combining price impacts. Table 15 shows the cross-border impact for New South Wales is 0.99070 (that is its unit costs are 0.9% below average) while Table 14 shows its combined input costs and dispersion price impact is 1.02115 (that is, its unit costs are 2.1% above average). So, its total price impact is 1.2% = (0.99070 * 1.02115 - 1)*100.

(b) This is the component factor after it has been scaled to ensure total assessed expenses equals average expenses (see Box 6). The component factor shown in Table 23 is the factor prior to scaling.

Source: Assessment System, U2008 GST/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/Derivation of child care component factor

DERIVING THE CHILD AND YOUTH SUPPORT SERVICES COMPONENT FACTOR

- 62 The amount each State needs to spend on child and youth support services costs is considered by the Commission to be influenced by the notional number of service users in its population — a use-weighted population calculation — and differences in:
- the costs of providing services to particular groups of service users;
 - the price of labour, accommodation and electricity; and
 - costs associated with the geographical dispersion of a States' population.

Socio-demographic composition factor

- 63 A socio-demographic composition (SDC) factor is assessed to take account of State differences in the use of services due to differing numbers of service users in State populations and differences in the costs of delivering services to different population sub-groups. The use of services is measured by service use rates. For each population sub-group, Australian average cost-weighted use rates are calculated, using census data. These are then applied to the State sub-group populations, which are then added to derive a use- and cost-weighted population (see Box 7). Specifically, the SDC factor takes account of State differences in:
- the use of services. The use of services is measured by actual and imputed service use rates by age, income and Indigeneity; and
 - the unit cost of providing services to users in special needs groups. The special needs groups are Indigenous users living in remote areas and users with low English fluency.

Box 7: Socio-demographic composition factor

Step 1: Obtain data on children in substantiation.

Data on the number of children in substantiation for abuse and neglect are obtained for age groups 0 to 14 and 15 to 17.

Step 2: Calculate numbers of children in substantiation per thousand. (results in use weights by age)

The number of children in substantiation per thousand aged 0 to 14 is calculated by dividing the number of children (from Step 1) by the estimated resident population in that age group, multiplied by 1000. The same is done for children aged 15 to 17.

Step 3: Calculate total number of children in substantiation.

The number of children aged 0 to 14 in substantiation is calculated by dividing the 2001 Census population aged 0 to 14 by 1000 and multiplying the result by the number of children in substantiation aged 0 to 14 per thousand (from Step 2). The same is done for children aged 15 to 17. These are then summed together.

Step 4: Obtain data on children on care and protection orders and in out of home care.

The number of children per thousand aged 0 to 17 on care and protection orders is obtained, disaggregated by Indigenous status.

The number of children per thousand aged 0 to 17 in out of home care is obtained, disaggregated by Indigenous status.

Step 5: Calculate number of children aged 0 to 17 per thousand on care and protection orders and in out of home care. (used to derive use weights by age and Indigeneity)

From Step 4, the number of non-Indigenous children aged 0 to 17 per thousand on care and protection orders is summed with the number of non-Indigenous children aged 0 to 17 per thousand in out of home care. The same is done for Indigenous children.

Step 6: Bring in additional use weights.

The Commission judged that people on low incomes use services at a rate four times that of people not on low incomes. Low income people are therefore assigned a use rate of 4.

The Commission judged that remoteness and English proficiency have no impact on service use rates, therefore these characteristics are assigned use weights of 1.

Step 7: Calculate matrix of Australian use weights per thousand.

A matrix of use weights by age, remoteness, English proficiency, income and Indigeneity is calculated by multiplying the use weights from the previous steps. This results in a single use weight for each sub-group of the population (for example, a low income non-Indigenous child aged 15 to 17, living in a non-remote area with low English fluency will have a use weight different to those of other population sub-groups).

Step 8: Calculate weighted relevant population in each sub-group.

The weighted relevant population in each sub-group is calculated by multiplying the matrix of use weights (from Step 7) by a matrix of the Census population.

Step 9: Calculate proportion of total relevant population in each sub-group.

The proportion of total relevant population in each sub-group is calculated by dividing the number of people in each weighted sub-group by the total weighted population.

Step 10: Calculate number of service users in each sub-group.

The number of service users in each sub-group is calculated by multiplying the total number of children in substantiation (from Step 3) by the proportions from Step 9.

Step 11: Calculate combined use weights matrix.

A matrix of combined use weights is calculated by dividing the number of users in each sub-group (from Step 10) by the total number of people in each sub-group from the Census.

Step 12: Allow for the additional costs of providing services to particular user groups

It costs more to provide services to some users. The Commission takes into account the additional costs of providing services to Indigenous users in remote areas (cost weight of 1.5) and users with low fluency in English (cost weight of 1.5). A combined cost weights matrix is derived by combining the cost weights multiplicatively.

Step 13: Calculate the factor

A weighted population is calculated for each sub-group by multiplying the use weights, cost weights and States' unweighted populations. Total State weighted populations are calculated by adding across all sub-groups. Ratios are calculated for each State and Australia by dividing the weighted population by its total population. Factors are calculated for each State by dividing its ratio by the Australian ratio. The final factors are rescaled.

Use of services

- 64 Actual data on children in substantiation are available disaggregated by age and are therefore used in the assessment.
- 65 Actual data on children on care and protection orders and in out of home care are available disaggregated by Indigeneity and are therefore used in the assessment.

66 Actual data on use of services disaggregated by income are not available. Therefore the Commission, based on available information, judged that children from low income families would use services four times more than children from high income families.

Unit cost of supplying services

67 Certain users of child and youth support services have special needs. It costs more to provide services to these users. The Commission takes into account the additional costs of providing child and youth support services to:

- Indigenous users in remote areas; and
- users with low fluency in English.

68 The Commission developed cost weights to recognise the additional average cost of providing child and youth support services to these groups. The costs were derived from judgement, based on limited data. Table 17 shows the cost weights assessed by the Commission. They imply, for example, that an Indigenous user living in a remote area who has low fluency in English involves a service cost 2.25 times more than that for a non-Indigenous user living in a non-remote area who is fluent in English.

Table 17 Socio-demographic composition cost weights for Family and Child Services, child and youth support services component, 2008 Update

	Low English fluency	Fluent in English
Indigenous persons — remote	1.5 * 1.5	1.5
Indigenous persons — non-remote	1.5	1.0
Non-Indigenous persons	1.5	1.0

Source: Commission Judgement.

Factor calculation

69 Table 18 shows the derivation of the child and youth support services socio-demographic composition factor for 2006-07. The number of notional users is the use- and cost-weighted population.

Table 18 Derivation of child and youth support services socio-demographic composition factor, 2006-07

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
A. Notional users (no.)	11 007	6 384	7 805	4 150	2 342	906	375	2 434	35 404
B. Mean resident population ('000)	6 856	5 168	4 136	2 082	1 577	492	337	213	20 859
C. Notional users per capita (A/B)	0.00161	0.00124	0.00189	0.00199	0.00149	0.00184	0.00111	0.01144	0.00170
D. Factor (C/C_{Aus})	0.94591	0.72783	1.11195	1.17447	0.87523	1.08594	0.65649	6.73844	1.00000
E. Scaled factor^(a)	0.94591	0.72783	1.11195	1.17447	0.87523	1.08594	0.65649	6.73844	1.00000

(a) This is the component factor after it has been scaled to ensure total assessed expenses equals average expenses (see Box 6).

Source: Assessment System, U2008 GST/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/Derivation of Child and Youth Support Services SDC Factor.

70 The socio-demographic composition factors are revised annually to allow for changes in service use and State populations. Table 19 shows the assessed factors for the 2008 Update.

Table 19 Family and Child Services, child and youth support services component, socio-demographic composition factor, 2008 Update

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
2002	0.92779	0.72614	1.15346	1.20821	0.89301	1.16740	0.69329	6.12655	1.00000
2003	0.92742	0.72584	1.15300	1.20772	0.89264	1.16692	0.69299	6.12434	1.00000
2004	0.94943	0.74449	1.10969	1.16720	0.88050	1.08123	0.66613	6.43259	1.00000
2005	0.94429	0.72804	1.11568	1.17888	0.87349	1.08179	0.65653	6.75568	1.00000
2006	0.94368	0.72754	1.11496	1.17812	0.87292	1.08107	0.65606	6.75220	1.00000

Source: Assessment System, U2008 GST/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/Child and Youth Support SDC factors

Input costs factor

71 The input costs factor in the child and youth support services component is the same as that used in the child care component.

Dispersion factor

72 The dispersion factor in the child and youth support services component is the same as that used in the child care component.

Child and youth support services component factor

73 The child and youth support services component factor represents the combined effects of the influences on use and unit costs of child and youth support services that are not affected by State policies. The socio-demographic composition factor captures the assessed service use and differences in the unit cost of providing services to service users with particular characteristics. The Commission recognises that the costs of providing these services will vary between States because:

- the unit costs of inputs vary between States; and
- the unit costs of service provision associated with the geographic dispersion of population vary between States.

74 Table 20 shows the derivation of a combined input costs and dispersion factor for 2006-07. It recognises that the two factors influence different types of expenses and so do not interact. Consequently, these factors can be combined by addition.

Table 20 Derivation of combined input costs and dispersion factor, 2006-07

Expense type	Prop'n %	NSW %	Vic %	Qld %	WA %	SA %	Tas %	ACT %	NT %
Input costs sub-total	72.5	2.2	-0.7	-1.3	-0.7	-2.2	-3.9	1.7	1.5
Dispersion sub-total	3.65	-0.1	-0.6	0.5	0.7	-0.5	-0.6	-2.2	10.5
Balance	23.8	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total price ^(a)		2.1	-1.3	-0.9	0.1	-2.7	-4.5	-0.5	12.0
Factor		1.02115	0.98699	0.99135	1.00079	0.97310	0.95462	0.99498	1.11996

(a) May not add due to rounding.

Source: Assessment System, U2008 GST/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/Derivation of Combined Input Costs and Dispersion Factor.

75 The Commission combines these influences by:

- using notional users from Table 18 as an indicator of assessed (cost weighted) service use;
- adjusting the assessed service use for the combined effect of differentials in the price of labour, accommodation and electricity and the costs of service provision associated with the geographic dispersion of population;
- dividing each State's cost and price weighted notional users by its population; and
- calculating the component factor by dividing each State's per capita figure by the average per capita figure.

76 Table 21 shows the derivation of the child and youth support services component factor for 2006-07. The calculation, based on notional users, can be compared with that derived using the formula:

$$\text{Child and youth support services component factor} = [\text{socio-demographic composition} * (\text{dispersion} + \text{input costs} - 1)]$$

77 The dispersion and input costs factors are added and then combined with the socio-demographic composition factor by multiplication.

Table 21 Calculation of child and youth support services component factor, 2006-07

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
A. Assessed service use (notional users from Table 18)									
Notional users (no.)	11 007	6 384	7 805	4 150	2 342	906	375	2 434	35 404
Differences in prices and unit costs									
B. Input Costs and									
Dispersion (%)	2.1	-1.3	-0.9	0.1	-2.7	-4.6	-0.5	12.0	0.0
C. Price of services (B)									
Price difference (%)	2.1	-1.3	-0.9	0.1	-2.7	-4.6	-0.5	12.0	0.0
D. Impact of differences in prices (A*C)									
Users (no.)	231	- 84	- 69	3	- 63	- 41	- 2	292	267
E. Notional users (A+D)									
Users (no.)	11 238	6 300	7 737	4 153	2 279	865	373	2 725	35 670
F. Population									
Population ('000)	6 856	5 168	4 136	2 082	1 577	492	337	213	20 859
G. Notional users per capita (E/F)									
Users per capita (no.)	0.00164	0.00122	0.00187	0.00199	0.00145	0.00176	0.00111	0.01281	0.00171
H. Factor (G/GAust)									
Factor ^(a)	0.95857	0.71289	1.09394	1.16645	0.84520	1.02877	0.64823	7.48937	1.00000

(a) This is the component factor after it has been scaled to ensure total assessed expenses equals average expenses (see Box 6). The component factor shown in Table 23 is the factor prior to scaling.

Source: Assessment System, U2008 GST/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/Derivation of child and youth support services component factor

DERIVING THE ISOLATION COMPONENT FACTOR

Isolation component

78 One factor is assessed for the isolation component.

Isolation factor

79 The isolation factor recognises the additional costs incurred by some States due to their distance from other State capitals and sources of supply. It is calculated by a general method. The method is discussed in Volume 7 of the 2004 Review Working Papers.

80 For Family and Child Services in 2006-07, the Commission assessed total isolation expenses of \$2.00 million. Table 22 shows the amount assessed for each State and the per capita equivalent. It also shows the isolation factor which is calculated by dividing each State's per capita amount by the average per capita amount.

Table 22 Isolation assessment and isolation factor, 2006-07

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
Isolation amount (\$m)	0.03	0.03	0.04	0.36	0.17	0.13	0.04	1.20	2.00
Amount per person (\$pc)	0.00	0.01	0.01	0.17	0.11	0.26	0.12	5.64	0.10
Factor	0.04081	0.06917	0.11309	1.80761	1.09363	2.75060	1.22840	58.74083	1.00000

Source: Assessment System, U2008 GST/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/Derivation of child and youth support services component factor

Isolation component factor

81 As only one factor is assessed for this component, the isolation component factor is assessed using the formula:

$$\text{Isolation component factor} = [\text{isolation}]$$

82 The isolation factor is revised annually to reflect changes in isolation expenses.

DERIVING CATEGORY FACTORS

83 Category factors measure the combined impact on a State of those circumstances which are beyond its control and which impact on its cost of providing family and child services. Category factors are calculated by:

- weighting the component factors to reflect the importance of the component in the category. This is done by multiplying each component factor by its component weight; and
- adding the weighted component factors together.

84 Table 23 summarises the components, component weights and disability factors, for this category factor for 2006-07, the last year of the 2008 Update.

Table 23 Family and Child Services, derivation of category factor, 2006-07

Factors	NSW	Vic	Qld	WA	SA	Tas	ACT	NT
Fixed Costs (component weight = 0.58 %)								
Administrative scale	0.37241	0.49408	0.61736	1.22628	1.61936	5.19306	7.58308	14.03500
Input costs	1.02528	0.99212	0.98387	0.99199	0.97579	0.95664	1.01939	1.01769
Component factor	0.38182	0.49019	0.60740	1.21645	1.58015	4.96790	7.73013	14.28324
A Wgted comp factor	0.00222	0.00285	0.00353	0.00707	0.00919	0.02889	0.04495	0.08305
Child and Youth Support Services (component weight = 94.87 %)								
Socio-demographic composition	0.94368	0.72754	1.11496	1.17812	0.87292	1.08107	0.65606	6.75220
Dispersion	0.99879	0.99425	1.00461	1.00725	0.99499	0.99372	0.97792	1.10467
Input costs	1.02223	0.99260	0.98661	0.99340	0.97798	0.96077	1.01693	1.01515
Component factor	0.96352	0.71798	1.10516	1.17889	0.84932	1.03187	0.65268	7.56120
B Wgted comp factor	0.90722	0.67603	1.04059	1.11000	0.79970	0.97158	0.61454	7.11940
Child Care (component weight = 4.47 %)								
Socio-demographic composition	1.00092	0.97375	1.04102	1.01963	0.91665	0.98928	0.97687	1.29749
Cross border	0.99070	1.00000	1.00000	1.00000	1.00000	1.00000	1.19625	1.00000
Dispersion	0.99879	0.99425	1.00461	1.00725	0.99499	0.99372	0.97792	1.10467
Input costs	1.02223	0.99260	0.98661	0.99340	0.97798	0.96077	1.01693	1.01515
Component factor	1.01246	0.96095	1.03187	1.02030	0.89187	0.94425	1.16256	1.45294
C Wgted comp factor	0.04524	0.04293	0.04610	0.04559	0.03985	0.04219	0.05194	0.06492
Isolation (component weight = 0.08 %)								
Isolation	0.04081	0.06917	0.11309	1.80761	1.09363	2.75060	1.22840	58.74083
Component factor	0.04081	0.06917	0.11309	1.80761	1.09363	2.75060	1.22840	58.74083
D Wgted comp factor	0.00003	0.00006	0.00009	0.00151	0.00092	0.00230	0.00103	0.04917
Category factor	0.95471	0.72187	1.09032	1.16417	0.84965	1.04495	0.71246	7.31654

Note: For each component, the component factor is calculated using the formula in the following paragraph. The weighted component factor is the component factor multiplied by the component weight and scaled to ensure total assessed expenses equals average expenses (see Box 6). The category factor is the sum of the weighted component factors. It equals A + B + C + D.

Source: Assessment System, U2008 GST/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/Family and Child Services Standardised Expenditure

85 The category factor was calculated as follows:

$$\text{category factor} = \text{fixed costs} + \text{child care} + \text{child and youth support services} + \text{isolation.}$$

where

$$\text{fixed costs} = 0.0058 [\text{administrative scale} * \text{input costs}]$$

$$\text{child care services} = 0.0447 [\text{socio-demographic composition} * \text{cross-border} * (\text{dispersion} + \text{input costs} - 1)]$$

$$\text{child and youth support services} = 0.9487 [\text{socio-demographic composition} * (\text{dispersion} + \text{input costs} - 1)]$$

$$\text{isolation} = 0.0008 [\text{isolation}]$$

86 In each case, the contributions to the category factor were calculated as the expense component weight multiplied by the factors (the bracketed terms in the formulas). Each contribution to the category factor was then rescaled to ensure that the sum of assessed equalled the sum of actual expenses.

RESULTS FOR 2006-07

87 Assessed expenses per capita are calculated by multiplying each State's category factor by the average expense per capita. Table 24 shows the actual, average and assessed expenses per capita and the assessed cost of providing services ratios for 2006-07. The assessed cost of providing services ratios are equivalent to the category factors shown in Table 23.

Table 24 Family and Child Services, assessment results, 2006-07

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Avg
	\$pc	\$pc	\$pc	\$pc	\$pc	\$pc	\$pc	\$pc	\$pc
Actual expenses	101.19	99.15	134.08	98.75	150.06	178.10	180.13	201.98	114.77
Assessed expenses	109.57	82.85	125.14	133.61	97.51	119.93	81.77	839.72	114.77
	%	%	%	%	%	%	%	%	%
Assessed cost of providing services ratio ^(a)	95.47	72.19	109.03	116.42	84.96	104.50	71.25	731.65	100.00

Note: ACT expenses may include municipal expenses

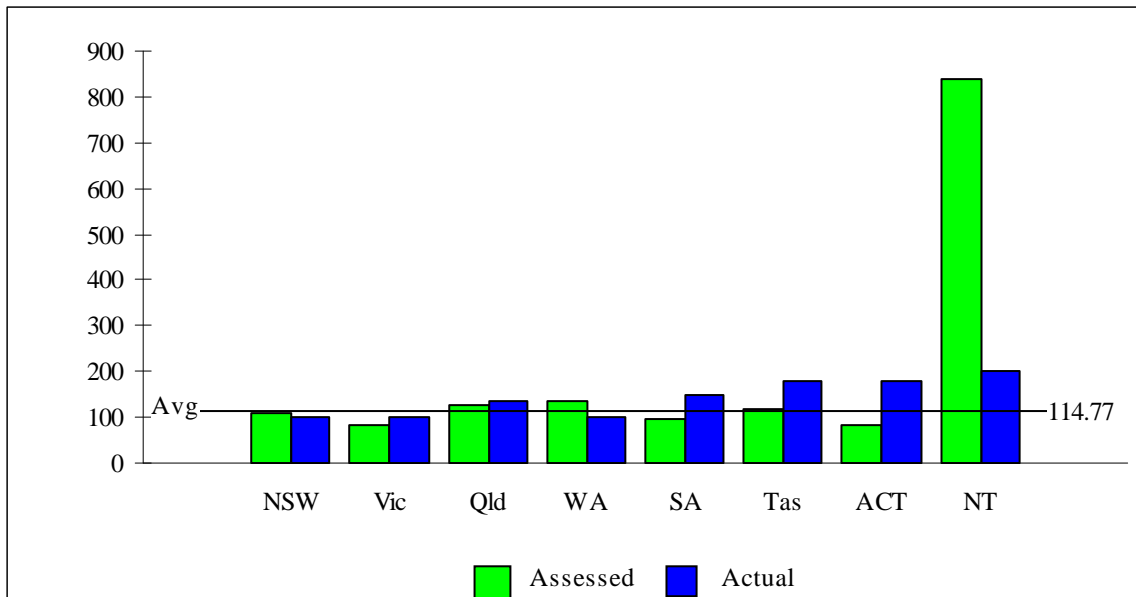
(a) The assessed cost of providing services ratio is the ratio of assessed to average gross expenses per capita.

Source: Assessment System, U2008 GST/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/Assessment Results

88 Table 35 at the end of this Working Paper summarises the results of the assessment. It shows the actual and assessed expenses for each State, as well as average expenses, for all years of the 2008 Update.

89 Figure 1 illustrates the actual, average and assessed expenses for Family and Child welfare for 2006-07. In that year, assessed expenses per capita for Queensland, Western Australia and the Northern Territory were above the average level of expenses per capita; those for New South Wales and Tasmania were close to the average; while those for Victoria, South Australia and the ACT were below average. Western Australia, South Australia, Tasmania, the ACT and the Northern Territory had the largest differences between assessed and actual expenses per capita.

Figure 1 Family and Child Services, assessed expense per capita, actual expenses per capita and average expenses per capita, 2006-07



Source: Assessment System, U2008 GST/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/Expenses Per Capita - Assessed, Actual and Average

GST REVENUE DISTRIBUTION FOR THE 2008 UPDATE

90 The assessed difference from average in dollars provides an indication of the impact of this assessment on GST shares. This is calculated by:

- subtracting the average expense per capita from each State’s assessed expenses per capita; and
- multiplying by each State’s population.

91 Table 25 shows this calculation for 2006-07.

Table 25 Assessed difference from average, 2006-07

		NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
Assessed expenses per person	\$pc	109.57	82.85	125.14	133.61	97.51	119.93	81.77	839.72	114.77
Assessed difference from average per person	\$pc	-5.20	-31.92	10.37	18.84	-17.26	5.16	-33.00	724.95	0.00
Population	m	6.856	5.168	4.136	2.082	1.577	0.492	0.337	0.213	20.859
Assessed difference from average ^(a)	\$m	-35.6	-165.0	42.9	39.2	-27.2	2.5	-11.1	154.3	238.9

(a) The Australian number is the total redistribution implied by the State differences from average.

Source: Assessment System, U2008 GST/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/Assessed Difference from Average, Year 5

- 92 Table 26 shows the assessed difference from average in millions of dollars for all years of the 2008 Update. The average of these amounts over the five year assessment period provides an indication of the impact of the assessment on GST shares. The actual impact depends on the growth in the size of the pool and population between the assessment years and the application year.

Table 26 Assessed difference from average, 2008 Update

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
	\$m	\$m	\$m	\$m	\$m	\$m	\$m	\$m	\$m
2001-02	-23.6	-94.5	27.7	24.9	-14.7	4.7	-5.3	80.8	138.0
2002-03	-27.9	-108.6	32.9	28.6	-16.4	5.1	-6.2	92.4	159.2
2003-04	-30.8	-117.0	36.7	30.9	-17.3	5.5	-6.7	98.8	171.9
2004-05	-22.7	-125.9	28.6	27.8	-21.3	2.4	-8.7	119.8	178.6
2005-06	-29.7	-148.9	35.2	34.1	-24.4	2.6	-10.0	141.1	213.0
2006-07	-35.6	-165.0	42.9	39.2	-27.2	2.5	-11.1	154.3	238.9
Average ^(a)	-28.4	-126.7	34.0	30.9	-20.2	3.8	-8.0	114.5	183.3

(a) The Australian number is the total redistribution implied by the State differences from average.

Source: Assessment System, U2008 GST/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/Assessed Difference from Average

- 93 The impact of the Family and Child Services assessment on the distribution of GST revenue and health care grants (hereafter referred to as GST revenue) can be estimated by taking the average from the Table above scaled by the growth in the pool. This impact can be subdivided to show the effect of each factor.
- 94 Table 27 shows the category's contribution to the distribution of GST revenue. It also shows the contribution of each factor and component.

Differences from an equal per capita assessment

- 95 Table 27 shows that, compared with an equal per capita (EPC) assessment, the 2008 Update redistributed \$228.4 million away from New South Wales, Victoria, South Australia and the ACT to the other States.
- 96 The Table indicates that the disabilities which had the biggest impact on the assessment were socio-demographic composition and input costs. The socio-demographic composition factors were the main drivers of the assessment and the redistribution resulting from them was consistent with the population characteristics of each State shown in Table 28.

Table 27 Family and Child Services, contribution of assessment to GST revenue distribution, 2007 Update

Factor	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total redist'd
	\$m	\$m	\$m	\$m	\$m	\$m	\$m	\$m	\$m
Fixed costs									
Administrative scale	-3.2	-1.9	-1.1	0.4	0.7	1.5	1.6	2.0	6.2
Input costs	0.2	0.0	-0.1	0.0	0.0	0.0	0.0	0.0	0.2
Component factor	-3.1	-1.9	-1.2	0.3	0.7	1.4	1.7	2.1	6.2
Child and youth support									
Socio-demographic composition	-45.3	-148.1	55.6	40.9	-19.9	5.7	-11.7	122.7	225.0
Dispersion	-0.9	-3.1	2.0	1.6	-0.8	-0.3	-0.8	2.4	6.0
Input costs	19.5	-2.1	-10.0	-2.9	-3.7	-1.9	0.7	0.5	20.7
Component factor	-32.4	-154.5	43.3	37.6	-24.8	2.9	-11.9	139.8	223.7
Child care									
Socio-demographic composition	0.1	-0.7	0.9	0.1	-0.6	0.0	0.0	0.3	1.4
Cross-border	-0.3	0.0	0.0	0.0	0.0	0.0	0.3	0.0	0.3
Dispersion	0.0	-0.1	0.1	0.1	0.0	0.0	0.0	0.1	0.3
Input costs	0.9	-0.1	-0.5	-0.1	-0.2	-0.1	0.0	0.0	1.0
Component factor	0.6	-0.9	0.4	0.0	-0.8	-0.1	0.3	0.5	1.9
Isolation									
Isolation	-0.7	-0.5	-0.4	0.2	0.0	0.1	0.0	1.3	1.6
Component factor	-0.7	-0.5	-0.4	0.2	0.0	0.1	0.0	1.3	1.6
Redistribution from EPC resulting from the 2008 Update assessment									
	-35.6	-157.9	42.2	38.2	-25.0	4.3	-10.0	143.8	228.4

Note: The redistribution due to the component factors includes the effect of interactions between factors. Therefore the component factor figure may not equal the sum of its factors' redistribution.

Source: Assessment System, U2008 GST/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/Contribution of Assessment to GST Revenue

97 The category factors reflected, and Table 28 shows, that:

- The Northern Territory had a significantly above average proportion of 0-17 year olds from low income families. It also had a much larger proportion of Indigenous children/youth aged 0-17 years. These population sub-groups use family and child services more than average. The Northern Territory also had a much higher proportion of Indigenous 0-17 year olds living in remote areas where services are more expensive to provide. This resulted in a much higher than average cost of providing services ratio, and so a very large positive GST redistribution.
- Queensland also had a higher than average proportion of its population in each of these population segments. Western Australia had a slightly lower than average proportion of

0-17 year olds from low income families (although a slightly higher than average proportion based on the 2001 Census — refer para 107 below), but a higher than average proportion of its population who were Indigenous 0-17 year olds and a significantly higher than average proportion of Indigenous 0-17 year olds living in remote areas. Tasmania had above average proportions of its population in all sub-groups other than Indigenous 0-17 year olds living in remote areas. These States therefore had above average cost ratios and positive GST redistributions.

- New South Wales and South Australia had slightly above average proportions of 0-17 year olds on low incomes — slightly lower in the case of New South Wales based on the 2001 Census — but below average proportions of Indigenous 0-17 year olds, including in remote areas. South Australia also had a significantly below average proportion of 0-17 year olds. This resulted in below average cost ratios and negative GST redistributions for these two States.
- Victoria and the ACT each had below average proportions in all population sub-groups. This resulted in well below average cost ratios and negative GST redistributions.

Table 28 Population distribution for family and child services

Population group	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
	%	%	%	%	%	%	%	%	%
0-17 years	23.0	22.6	24.0	23.6	21.9	23.3	22.6	28.8	23.1
0-17 years, low income	5.6	5.1	5.5	5.2	5.5	6.4	3.1	9.1	5.4
0-17, Indigenous	0.9	0.3	1.6	1.5	0.7	1.5	0.5	12.6	1.1
0-17, remote Indigenous	0.07	0.00	0.33	0.61	0.10	0.01	0.00	9.11	0.25

Source: ABS 2006 Census of Population and Housing.

CHANGES SINCE THE 2007 UPDATE

Effect of assessment on the distribution of GST revenue

- 98 Table 29 shows the distribution of GST revenue resulting from the assessments in the 2007 Update and the 2008 Update. It also shows the sources of the changes.
- 99 Changes in the distribution of GST revenue between the 2007 Update and the 2008 Update were brought about because the Commission:
- used revised financial data in the average expenses and other revised data in factor calculations for the years 2001-02 to 2005-06; and
 - replaced 2001-02 average expenses and factors with those of 2006-07 to move forward the five-year period on which GST revenue distribution was based. Moving the five-year period forward in this way ensures the assessments reflect recent trends in State priorities on the

services provided and recent trends in State demographic, and economic circumstances on the relative costs of those services.

- 100 With the availability of 2006 Census data, these have now been included in the socio-demographic composition and cross-border factor calculations for the years 2004-05 through 2006-07, while 2001 Census data have continued to be used in the calculations for the earlier assessment years.

Table 29 Family & child services, effect of assessment on GST revenue distribution, 2007 Update to 2008 Update

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total redist'd
	\$m	\$m	\$m	\$m	\$m	\$m	\$m	\$m	\$m
Redistribution from EPC resulting from the 2007 Update assessment (a)									
	-40.8	-151.5	47.8	39.8	-22.2	6.7	-8.6	128.7	223.0
Effect of revising category averages and factors for 2001-02 to 2005-06									
Category average	-0.8	-2.8	0.9	0.7	-0.4	0.1	-0.2	2.4	4.2
Category factors	6.1	2.3	-6.8	-3.0	-1.0	-1.7	-0.5	4.6	12.9
Interactions	0.1	0.0	-0.1	-0.1	0.0	0.0	0.0	0.1	0.3
Total	5.4	-0.5	-6.0	-2.3	-1.4	-1.6	-0.7	7.1	12.5
Effect of replacing 2001-02 category averages and factors with those for 2006-07									
Category average	-1.2	-4.7	1.4	1.2	-0.7	0.2	-0.3	4.0	6.8
Category factors	0.8	-1.0	-0.9	-0.5	-0.5	-0.9	-0.4	3.4	4.2
Interactions	0.1	-0.2	-0.1	-0.1	-0.1	-0.1	-0.1	0.6	0.7
Total	-0.2	-5.9	0.4	0.7	-1.3	-0.8	-0.8	8.0	9.0
Redistribution from EPC resulting from the 2008 Update assessment (a)									
	-35.6	-157.9	42.2	38.2	-25.0	4.3	-10.0	143.8	228.4
Total effect of revisions and updating (b)									
	5.2	-6.4	-5.6	-1.6	-2.8	-2.5	-1.4	15.0	20.2

(a) Using the same pool and populations that were used to calculate the 2007 Update redistribution.

(b) This figure shows the change in the amount redistributed among the States between the 2007 Update and the 2008 Update. It does not necessarily equal the difference in the total redistribution from EPC between the two inquiries.

Source: Assessment System, U2008 GST/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/Effect of Assessment, Previous Inquiry to Current Inquiry

- 101 The total effect of revisions and updating was to increase the amount redistributed and to redistribute \$20.2 million across States. The biggest redistribution was to the Northern Territory.

102 Table 30 shows the changes in GST revenue attributable to changes in each factor arising from both revisions over the period 2001-02 to 2005-06 and replacing 2001-02 data with 2006-07 data.

Table 30 Family & child services, effect of assessment on GST revenue distribution by factor, 2007 Update to 2008 Update

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total redist'd
	\$m	\$m	\$m	\$m	\$m	\$m	\$m	\$m	\$m
Fixed costs									
Administrative scale	0.2	0.1	0.0	0.0	0.0	-0.1	-0.1	-0.1	0.3
Input costs	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Children and youth support									
Socio-demographic composition	5.4	-6.7	-6.9	-2.0	-2.9	-2.4	-1.5	17.0	22.4
Dispersion	-0.6	-0.5	-0.3	-0.1	-0.1	0.0	0.0	1.6	1.6
Input costs	-0.9	-0.6	1.2	0.3	0.1	0.0	0.0	-0.1	1.6
Child care									
Socio-demographic composition	0.2	-0.1	0.1	0.0	-0.1	0.0	0.0	0.0	0.3
Cross-border	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Dispersion	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Input costs	0.0	0.0	0.1	0.0	0.0	0.0	0.0	0.0	0.1
Isolation									
Isolation	0.0	0.0	0.0	0.0	0.0	0.0	0.0	-0.1	0.1

Source: Assessment System, U2008 GST/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/Effect of Assessment by Factor, Previous Inquiry to Current Inquiry

103 The main reasons for the changes in GST revenue distribution between the two updates are explained in more detail in the following sections.

Changes due to revising average expenses and factors for years 2001-02 to 2005-06

Revising average expenses

104 Revisions for this category have been relatively modest upwards. This increased the amount of GST revenue redistributed for that period (\$4.2 million). It increased the GST revenue shares of the States assessed to have above average costs of providing services (Queensland, Western Australia, Tasmania and the Northern Territory). It reduced the GST revenue shares of other States.

105 The upward revisions have stemmed from the replacement of 2005-06 UPF data with GFS data as well as changes to Tasmanian data in all years in line with the adoption of improved UPF data for 2006-07. The revisions to 2005-06 data were partly offsetting — upward revisions for Victoria, Queensland and Tasmania and a downward revision for South Australia.

106 Table 31 shows the average expenses for the six financial years of this update and those of the previous update. The category also includes user charges, which are assessed equal per capita. They are not discussed in this paper because they have no effect on redistributions.

Table 31 Family & child services, Average expenses used in the 2007 and 2008 Updates

	2000-01	2001-02	2002-03	2003-04	2004-05	2005-06	2006-07
	\$pc	\$pc	\$pc	\$pc	\$pc	\$pc	\$pc
2008 Update		73.32	80.62	85.89	97.06	106.18	114.77
2007 Update	66.68	73.11	78.61	84.35	95.60	104.08	
Difference	-	0.22	2.01	1.54	1.46	2.11	-

Source: Assessment System, U2008 GST/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/Average Expenses Used in the 2007-08 Updates

Revising category factors

107 A significant redistribution of GST (\$12.9 million) occurred as a result of revisions to category factors. The redistributions were largely due to the effect of incorporating 2006 Census data into the assessment for child and youth support services (Table 32).

Table 32 Family & child services, GST revenue redistributions resulting from revisions to category factors

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust.
	\$m	\$m	\$m	\$m	\$m	\$m	\$m	\$m	\$m
Total redistrib ⁿ	6.1	2.3	-6.8	-3.0	-1.0	-1.7	-0.5	4.6	12.9
Impact of Census	6.6	4.1	-7.4	-3.5	-0.8	-1.7	-0.4	3.1	13.7
	\$pc	\$pc	\$pc	\$pc	\$pc	\$pc	\$pc	\$pc	\$pc
Total redistrib ⁿ net of Census impact	-0.08	-0.35	0.16	0.26	-0.12	-0.06	-0.29	6.94	0.13

Source: Assessment System, U2007 GST 2006 Census Data/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/4160 E Effect of Assessment, Previous Inquiry to Current Inquiry; U2008/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/4160 E Effect of Assessment, Previous Inquiry to Current Inquiry

108 The measured share of State populations who are aged 0-17 with low family incomes has declined in all States, but the fall was strongest in Queensland, Western Australia and Tasmania, and weakest in New South Wales and Victoria. (For the 2001 Census, low family incomes were defined as incomes less than \$31 200, while for the 2006 Census they were defined as incomes less than \$33 800.) Table 33 shows for each State the proportion of the 0-17 low income population segment in total population. This is the main population segment driving child & youth support expenses and, in turn, category expenses. Consequently, Queensland, Western Australia and Tasmania and the ACT experienced the largest decline in their per capita shares of GST revenue.

109 The sizeable redistribution away from Tasmania also reflected a sizeable drop in its 0-17 Indigenous population between the two censuses. The large redistribution towards the Northern Territory resulted from the growth in its 0-17 Indigenous population, reinforced by a

'dispersion' effect² and an upward revision to 2005-06 Indigenous use rates resulting from the availability of updated data.

Table 33 Shares of low income 0-17 year old population in total population

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
	%	%	%	%	%	%	%	%	%
2006 Census	5.6	5.1	5.5	5.2	5.5	6.4	3.1	9.1	5.4
2001 Census	6.6	6.1	7.7	7.4	7.1	8.8	4.5	10.7	6.9
Change	-1.0	-1.0	-2.3	-2.2	-1.6	-2.4	-1.4	-1.6	-1.5

Source: ABS, 2006 and 2001 Censuses, special data request

Changes in State circumstances — replacing 2001-02 with 2006-07 data

110 Table 34 shows the actual expenses and implied costs of service provision for 2001-02, the year that drops out of the assessment period, and 2006-07, the year that comes in, for the 2008 Update assessment.

Replacing average expenses

111 Since 2001-02, State spending on this function has increased by 67.1 per cent, more than the 43.9 per cent growth in the GST pool. The category therefore became more important to the calculation of relativities, resulting in a greater redistribution of GST revenue (\$6.8 million). In consequence, the GST revenue shares increased in States with above average 2001-02 costs of providing services ratios — Queensland, Western Australia, Tasmania and the Northern Territory — and decreased in the other States.

² The dispersion measure recognises the differences in per capita costs of service provision associated with the spread of population, and is combined multiplicatively with the socio-demographic composition factor.

Table 34 Family & child services, actual expenses and assessed cost of providing services, 2001-02 and 2006-07

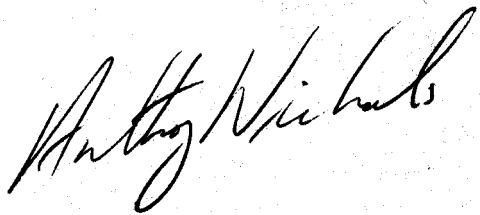
	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Avg
	\$pc	\$pc	\$pc	\$pc	\$pc	\$pc	\$pc	\$pc	\$pc
Actual expenses									
2001-02	80.17	75.41	48.65	69.28	68.77	109.68	148.65	116.53	73.32
2006-07	101.19	99.15	134.08	98.75	150.06	178.10	180.13	201.98	114.77
	%	%	%	%	%	%	%	%	%
Change between 2001-02 and 2006-07	26.22	31.47	175.62	42.54	118.20	62.38	21.18	73.33	56.53
	\$pc	\$pc	\$pc	\$pc	\$pc	\$pc	\$pc	\$pc	\$pc
Assessed expenses									
2001-02	69.75	53.78	80.85	86.31	63.66	83.27	56.92	480.38	73.32
2006-07	109.57	82.85	125.14	133.61	97.51	119.93	81.77	839.72	114.77
	%	%	%	%	%	%	%	%	%
Assessed cost of providing services ratio									
2001-02	95.13	73.35	110.27	117.71	86.82	113.57	77.63	655.17	100.00
2006-07	95.47	72.19	109.03	116.42	84.96	104.50	71.25	731.65	100.00

Source: Assessment System, U2008 GST/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/Assessment Data, Year 0 and Year 5

Replacing category factors

- 112 For New South Wales and the Northern Territory, the 2006-07 cost of providing services ratios were higher than the 2001-02 ratios. Replacing the category factors therefore increased their shares of GST revenue (by \$4.2 million). Replacing the category factors reduced the shares of the other States.
- 113 The observed changes were partly driven by the incorporation of 2006 Census data into the socio-demographic composition factors (see earlier discussion). The 2006 Census data have been included in the factor calculations for the years 2004-05 through 2006-07 (i.e two years are reflected in the revision effect while one year is reflected in the replacement effect). Increases over the period in child & youth support service use rates, especially amongst the Indigenous population, have also added to the size of the per capita redistribution towards the Northern Territory — given its relatively large population in these sub-groups.

This working paper was prepared by the Expense — Health and Welfare section of the Commonwealth Grants Commission. If you have any questions about its content please contact Anthony Nichols on (02) 6229 8858 or Anthony.Nichols@cgc.gov.au.

A handwritten signature in black ink that reads "Anthony Nichols". The signature is written in a cursive style with a large initial 'A' and 'N'.

Date: 29/2/08.

Table 35 Assessment of expenses, Family & child services

	2002-03		2003-04		2004-05		2005-06		2006-07	
	Amount	Per Capita	Amount	Per Capita	Amount	Per Capita	Amount	Per Capita	Amount	Per Capita
	\$m	\$	\$m	\$	\$m	\$	\$m	\$	\$m	\$
Average Expenses		80.62		85.89		97.06		106.18		114.77
New South Wales										
Assessed difference	- 27.925	- 4.20	- 30.828	- 4.61	- 22.742	- 3.38	- 29.712	- 4.38	- 35.635	- 5.20
Expenses - Assessed	508.441	76.42	544.000	81.28	630.728	93.68	691.169	101.81	751.202	109.57
Actual	575.380	86.49	650.082	97.14	609.967	90.60	660.609	97.31	693.737	101.19
Victoria										
Assessed difference	- 108.613	- 22.19	- 117.042	- 23.62	- 125.918	- 25.09	- 148.885	- 29.24	- 164.952	- 31.92
Expenses - Assessed	286.057	58.43	308.640	62.27	361.261	71.97	391.697	76.94	428.121	82.85
Actual	417.848	85.36	415.861	83.91	453.854	90.42	502.734	98.75	512.337	99.15
Queensland										
Assessed difference	32.950	8.75	36.707	9.50	28.621	7.23	35.240	8.70	42.868	10.37
Expenses - Assessed	336.685	89.37	368.477	95.39	412.626	104.29	465.164	114.89	517.511	125.14
Actual	197.866	52.52	228.116	59.06	388.218	98.12	490.653	121.18	554.484	134.08
Western Australia										
Assessed difference	28.639	14.77	30.903	15.70	27.810	13.91	34.072	16.71	39.230	18.84
Expenses - Assessed	184.924	95.39	199.955	101.59	221.927	110.96	250.539	122.90	278.185	133.61
Actual	135.863	70.09	151.475	76.96	166.011	83.01	177.843	87.24	205.609	98.75
South Australia										
Assessed difference	- 16.408	- 10.75	- 17.323	- 11.28	- 21.301	- 13.77	- 24.409	- 15.64	- 27.206	- 17.26
Expenses - Assessed	106.647	69.87	114.630	74.61	128.814	83.29	141.289	90.54	153.744	97.51
Actual	131.144	85.92	136.649	88.95	164.056	106.07	153.483	98.36	236.589	150.06
Tasmania										
Assessed difference	5.133	10.81	5.489	11.42	2.400	4.95	2.622	5.37	2.537	5.16
Expenses - Assessed	43.432	91.43	46.776	97.31	49.455	102.01	54.489	111.55	58.963	119.93
Actual	54.434	114.59	57.862	120.37	66.056	136.25	77.859	159.39	87.563	178.10
Australian Capital Territory										
Assessed difference	- 6.219	- 19.19	- 6.736	- 20.65	- 8.666	- 26.38	- 10.021	- 30.16	- 11.111	- 33.00
Expenses - Assessed	19.914	61.43	21.282	65.24	23.221	70.68	25.258	76.02	27.531	81.77
Actual	46.946	144.83	41.944	128.58	77.000	234.37	77.000	231.76	60.650	180.13
Northern Territory										
Assessed difference	92.443	463.51	98.830	491.92	119.797	586.46	141.093	675.99	154.270	724.95
Expenses - Assessed	108.522	544.14	116.086	577.81	139.624	683.52	163.256	782.17	178.693	839.72
Actual	35.141	176.20	37.856	188.43	42.494	208.02	42.679	204.48	42.982	201.98

Note: Refer to Attachment A of the 2008 Update, Relative Fiscal Capacity of States for how these figures are compiled.

Source: Assessment System, U2008 GST/Expenses/Health and Community Services/Family and Child Services/Tables and Chart/Assessment of Expenses