

Transformational Change in Climate Change Impacted Regions

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Table 1: Drought Experience Classification of NSW Statistical Divisions

Source: ABS (2006a) and NSW DII (various).

Statistical Division	Drought Classification
North Western	Chronic Drought (CD)
Far West	Chronic Drought (CD)
Murrumbidgee	Drought Prone (DP)
Murray	Drought Prone (DP)
Richmond-Tweed	DP Highly Variable (DPHV)
South Eastern	DP Highly Variable (DPHV)
Northern	DP Highly Variable (DPHV)
Central West	DP Highly Variable (DPHV)
Mid-North Coast	Marginal Drought (MD)
Sydney	Marginal Drought (MD)
Hunter	Marginal Satisfactory (MS)
Illawarra	Marginal Satisfactory (MS)

Table 2: NSW Employment Structure 1996, 2001 and 2006 (%)

Source: Calculated from ABS (2006b).

	1996	2001	2006
Agriculture	3.6	3.3	2.7
Mining	0.8	0.6	0.7
Manufacturing	11.5	11.0	9.6
Utilities	1.0	1.0	1.0
Construction	6.4	6.8	7.5
Services	73.8	75.2	76.1

Table 3: Regional Employment Structure 2001 and 2006*Source: Calculated from ABS (2006b).*

2001 (%)	FW	NW	Me	My	RT	SE	N	CW
Agriculture	9.9	19.2	16.8	17.3	7.5	10.2	19.3	14.0
Mining	6.7	2.2	0.1	0.1	0.2	0.3	0.4	2.6
Manufacturing	3.1	6.5	10.4	12.9	8.5	7.2	6.6	11.3
Utilities	2.2	0.9	1.3	1.0	0.7	1.3	0.7	1.5
Construction	4.7	5.1	5.2	5.4	7.2	7.1	5.1	5.6
Services	73.4	66.1	66.2	63.3	76.0	73.9	67.8	65.1
2006 (%)								
Agriculture	7.5	16.4	13.2	14.4	5.6	7.9	16.9	11.9
Mining	8.9	3.1	0.1	0.2	0.3	0.3	0.5	3.4
Manufacturing	3.1	5.7	11.2	11.6	7.6	6.5	7.0	9.7
Utilities	2.5	1.2	1.3	1.1	0.8	1.4	0.9	1.6
Construction	4.8	6.0	6.1	7.2	9.3	8.4	6.1	6.1
Services	73.1	67.6	68.1	65.4	76.5	75.6	68.6	67.1

Table 4: % Point Changes in Regional Employment Structure 1996, 2001 and 2006*Source:* Calculated from Table 3.

2001-2006	FW	NW	My	RT	SE	N	CW
Agriculture	-2.4	-2.8	-2.9	-1.9	-2.3	-2.5	-2.0
Mining	2.2	1.0	0.1	0.1	0.0	0.1	0.8
Manufacturing	0.1	-0.8	-1.3	-0.9	-0.7	0.4	-1.5
Utilities	0.3	0.3	0.1	0.1	0.1	0.2	0.1
Construction	0.1	0.9	1.8	2.1	1.3	1.0	0.5
Services	-0.2	1.5	2.1	0.5	1.7	0.8	2.1
1996-2006							
Agriculture	-1.7	-3.0	-4.4	-3.1	-3.3	-2.5	-2.1
Mining	-1.2	-0.4	0.1	0.0	-0.3	-0.1	0.3
Manufacturing	0.1	-0.3	0.4	-1.7	-0.5	0.3	-2.0
Utilities	0.6	0.2	-0.4	0.0	-0.1	-0.2	-0.1
Construction	-1.8	0.9	2.5	2.1	2.1	1.6	1.1
Services	3.9	2.7	1.8	2.8	2.1	0.9	2.7

$$CRD_{rS} = \frac{1}{2} \sum_{i=1}^n \left| \left(\frac{x_{ir}}{x_r} \right) - \left(\frac{x_i}{x_S} \right) \right|$$

$$CRRS = \frac{[\sum_{i=1}^n (x_i - \bar{x}_i)^2 / (n - 1)]^{1/2}}{\bar{x}_i}$$

Table 5: Coefficient of Regional Diversity (CRD)*Source: ABS (2006b)*

	FW	NW	Me	My	RT	SE	N	CW
1996	0.246	0.207	0.172	0.181	0.152	0.159	0.195	0.161
2001	0.254	0.193	0.169	0.176	0.146	0.158	0.188	0.156
2006	0.252	0.193	0.157	0.157	0.142	0.162	0.171	0.153
Changes								
1996-2001	0.007	-0.014	-0.002	-0.005	-0.006	-0.001	-0.007	-0.005
2001-2006	-0.002	0.000	-0.012	-0.019	-0.004	0.004	-0.017	-0.003
1996-2006	0.005	-0.014	-0.014	-0.024	-0.009	0.003	-0.024	-0.008
Population								
1996	22031	111230	147294	110524	219329	197943	172395	170899

Table 6: Coefficient of Relative Regional Specialisation (CRRS)*Source: ABS (2006b)*

	FW	NW	Me	My	RT	SE	N	CW
1996	0.754	0.875	0.842	0.909	0.726	0.676	0.903	0.764
2001	0.703	0.896	0.874	0.921	0.809	0.752	0.921	0.780
2006	0.768	0.859	0.872	0.928	1.035	0.946	0.904	0.785
Changes								
1996-2001	-0.050	0.021	0.032	0.013	0.083	0.076	0.018	0.016
2001-2006	0.064	-0.038	-0.002	0.006	0.226	0.195	-0.017	0.005
1996-2006	0.014	-0.017	0.030	0.019	0.309	0.271	0.001	0.021

Table 7: Share of NSW Employment

Source: Calculated from ABS (2006b).

Statistical			
Division	1996	2001	2006
Far West	0.003	0.003	0.003
North West	0.018	0.017	0.016
Murrumbidgee	0.024	0.023	0.023
Murray	0.018	0.017	0.017
Richmond-			
Tweed	0.027	0.027	0.030
South Eastern	0.028	0.028	0.030
Northern	0.027	0.026	0.025
Central West	0.027	0.026	0.025

$$Bx_{ir} = \left(\frac{x_{ir}}{x_r} - \frac{x_{is}}{x_s} \right) e_r$$

$$TBx_r = \sum_{i=1}^n Bx_{ir}$$

$$xM_r = \frac{x_r}{TBx_r}$$

Table 8: Regional Employment Multipliers (2006)

Source: ABS (2006a)

Statistical Division	Employment Multiplier
North Western	4
Far West	3.5
Murrumbidgee	4.5
Murray	4.9
Richmond-Tweed	5.9
South Eastern	5.4
Northern	4.4
Central West	4.9
