

the 1999 study by Cameron that reported 21 percent of all jobs were directly or indirectly derived from exports.

The following section re-visits the import and job embodiment of exports using the 2008 Statistics Canada I/O tables—the most recent year available.

Imports and employment embodied in exports in 2008

In 2008, exports accounted for 35.4 percent of GDP. However, when the import content (26.3 percent) is removed from gross exports, the share of value-added exports in GDP slips to 26.1 percent. Table 1 shows that, on average 10.1 percent of all jobs were directly related to exports, and generated an additional 0.9 jobs indirectly (through supplying inputs needed to produce the exported

good—such as steel for making cars) for each direct job created.¹ This means that for the economy overall, 19.3 percent of all jobs were directly or indirectly related to exports, or one in five jobs.

The six major sub-sectors of the economy display considerable variation in their export orientation, or share of exports in sectoral GDP. As expected, construction activities are almost exclusively focused on the domestic market, while Canadian manufacturers, always searching for new offshore markets, have the greatest degree of export orientation, at 164 percent. While it may seem odd for a sector to register a degree of export orientation in excess of 100 percent (given that exports are only one part of total production), this is explained by the fact that the I/O tables report exports

TABLE 1
Employment and Import Content Embodied in Exports, 2008

Sector	Exports as a share of GDP (%)	Import content of exports (%)	Value-added exports as a share of GDP (%)	Percentage of industry jobs directly related to exports (%)	Export employment multiplier #	Percentage of all jobs in the sector related to exports (%)
Total Economy	35.4	26.3	26.1	10.1	1.9	19.3
Agriculture, forestry, fishing, & hunting	65.4	18.8	53.1	23.0	1.9	43.6
Mining and oil & gas extraction	76.5	7.8	70.5	32.5	3.7	118.6
Utilities	10.9	10.4	9.8	7.6	1.8	13.5
Construction	0.2	14.2	0.1	0.0	1.6	0.1
Manufacturing	164.4	40.1	98.5	43.0	2.2	93.1
Services	10.8	11.9	9.5	6.0	1.5	9.2

Source: Statistics Canada I/O division and author's calculations

¹ In other words, total exports have an overall employment multiplier of 1.9, which means that each job directly associated with exports is associated with 1.9 jobs in the economy (i.e., 1 direct job plus 0.9 indirect jobs). Cross and Ghanem (2006) suggest that such multipliers show the linkages between a change in a factor in one industry and its ripple effect on others.