MEASURE OF DAMAGES FOR THE WRONGFUL DEATH OF A CHILD

Christopher J. Bruce*
Calgary

In St. Lawrence v. Lett the Supreme Court of Canada ruled that damages may only be awarded in fatal accident claims if those damages are "capable of a pecuniary estimate". The purpose of this paper is to argue that the value which parents place upon a child is capable of pecuniary estimate and, therefore, that (non-dependent) parents may be able to mount a successful claim for damages following the death of a child. This argument is based upon recent theories of fertility which hold that couples choose the numbers of children which they will bear based upon comparisons of the "costs" and "benefits" which children will bring to them. Estimates are made of the net losses of benefits which will arise if a child is killed, variously, on its sixth, twelfth, or eighteenth birthday.

Dans la cause St. Lawrence c. Lett, la Cour suprême du Canada a décidé que des dommages-intérêts peuvent être accordés dans les cas de réclamations faisant suite à un accident mortel, seulement si ces dommages-intérêts "peuvent être évalués en termes pécuniaires". Le but de cet exposé est de démontrer que l'on peut évaluer en termes pécuniaires la valeur que les parents attachent à un enfant et que, par conséquent, des parents (qui ne sont pas des dépendants) peuvent intenter avec succès un procès en dommages-intérêts à la suite du décès d'un enfant. Cet argument s'appuie sur des théories récentes de la fertilité qui avancent que les couples choisissent le nombre d'enfants qu'ils auront en se basant sur des comparaisons des "coûts" et des "bénéfices" que les enfants occasionneront. Les devis sont calculés d'après les pertes nettes de bénéfices qui seront encourues si un enfant est tué, et cela de façon variable selon qu'il a atteint son sixième, son douzième ou son dix-huitième anniversaire.

Introduction

In most jurisdictions which follow the English legal system, claims by family members pursuant to a fatal accident are brought under legislation which has been modelled on Lord Campbell's Act. This legislation is generally so broadly worded that recovery for all losses, whether pecuniary or non-pecuniary, could be allowed. Section 2 of Lord Campbell's Act, for example, says only that such damages may be awarded as are proportioned to the injury resulting from such death to the defendants respectively. Canadian legislation based upon this Act is similarly ambiguous. The Alberta Fatal Accidents Act, for example, states only that: "...the court may give to the parties... for whose benefit the action

^{*}Christopher J. Bruce, of the Department of Economics, University of Calgary, Calgary, Alberta.

^{1 (1846), 9 &}amp; 10 Vict., c. 93.

has been brought such damages as the Court thinks proportioned to the injury resulting from the death."²

In spite of the leeway which this legislation gave them, however, the courts moved quickly to limit the rights of recovery. In Blake v. Midland Railway Company,³ the English courts interpreted Lord Campbell's Act to exclude non-pecuniary damages altogether; and in Franklin v. South Eastern Railway Company.⁴ they further restricted recovery to loss of "... reasonable expectation of pecuniary benefit..." The Canadian courts soon followed, and in St. Lawrence & Ottawa Railway v. Lett,⁵ the Supreme Court of Canada concluded that "... the injury [to the claimants] in st. not be sentimental or the damages a mere solatium, but must be capable of a pecuniary estimate...".

On the other hand, the majority decision in *St. Lawrence* made it clear that the phrase "capable of a pecuniary estimate" was not meant to require that "... the loss was a pecuniary loss of so many dollars or so much property". Rather, provided that the injury was "substantial", compensation could be awarded for the loss of many types of benefits which would not normally be bought and sold in the market place, or otherwise valued in pecuniary terms. In particular, in *St. Lawrence* the Supreme Court upheld a jury award of \$860 to each of five dependent children for the loss of "... the care, education and training..." of their mother. Furthermore, the decision in *St. Lawrence*, (and in a number of intervening cases), was reaffirmed by the Supreme Court in its recent decision in *Vana* v. *Tosta*. There, a twelve and a half year old girl and a ten year old boy were awarded \$2,000 and \$1,000, respectively, for the loss of the "... care, education... training... guidance, example and encouragement..." of their mother.

In short, Canadian precedent suggests that compensation may be awarded in fatal accident cases even when the losses involved are not normally considered to be pecuniary in nature. Rather, the losses need only be "capable of a pecuniary estimate". Granted, the line of cases which supports this view refers virtually exclusively to claims in which children have lost the guidance of their mother. Nevertheless, the possibility remains that the courts will entertain the argument that parents are entitled to compensation for the loss of a child, provided that the plaintiffs

² R.S.A. 1955, c. 111, s.4(1).

³ (1852), 18 Q.B. 93, 118 E.R. 35 (Q.B.)

⁴ (1858), 3 H. & N. 211, 157 E.R. 448 (Exch.).

⁵ (1885), 11 S.C.R. 422, at p. 433. (Emphasis added).

⁶ *Ibid.*, at p. 432.

⁷ *Ibid.*, at p. 432.

^{8 [1968]} S.C.R. 71, (1967), 66 D.L.R. (2d) 97.

⁹ *Ibid.*, at pp. 79 (S.C.R.), 117 (D.L.R.).

can offer a "pecuniary estimate" of the value of that loss. It is my intention in this paper to describe a technique by which an objective estimate of this value might be constructed.

The argument will be developed in six parts. In Part I, I will offer empirical and theoretical support for the propositions: (1) that couples choose the sizes of their families on the basis of the perceived costs and benefits of children; and (2) that many of the benefits which children are perceived to bring to their parents arise after the children have reached adulthood and left home. In Part II, I will argue that the pecuniary loss suffered by parents upon the death of a child may be derived by estimating the difference between the benefits which they have foregone and the costs which they have "saved". In Sections III and IV, I will show how empirical estimates of the values of first and subsequent children may be derived. Two caveats will be raised in Part V. And in Part VI, I will contrast the estimates of losses derived in Parts III and IV with those which have been established in a number of recent Canadian cases.

I. The Benefits Provided by Children

In the last two decades a consensus has begun to develop among social scientists concerning the major factors which alter human fertility rates. These factors have been found to be consistent with the assumption that couples make rational choices about the numbers of children which they wish to have. Although it is recognised that many births will be the unplanned concomitant of sexual activity, biologically-based theories—which rely, for example, on assumptions about average numbers of years of fertility, effects of breast feeding on spacing between births, and ability of parents to provide sustenance for their children—have lost favour. Their place has been taken by theories which assume that parents (as a rule) choose to have children only if they believe that the benefits which children will provide them exceed the costs. The reason that this latter set of theories has become popular is that the hypotheses which it has produced have been verified in large numbers of empirical tests conducted in many countries, using data from many different time periods.

The first, and simplest, set of such hypotheses is that couples will have more children the greater are the benefits which children are perceived to provide and the lesser are the costs. ¹⁰ For example, it has often been suggested that rural families have traditionally had more children than have urban families both because food and shelter were less expensive in rural areas than urban and because children have been more

¹⁰ For an excellent review of this literature, see R. Lee and R. Bulatao, The Demand for Children: A Critical Essay, in R. Bulatao and R. Lee, Determinants of Fertility in Developing Countries (1983), p. 233.

productive in rural areas than urban. ¹¹ Similarly, it has also been argued that programs which have provided aid to mothers with dependent children have increased fertility rates by reducing the costs of children; ¹² and that increases in the wage rates of young women have decreased fertility rates by increasing the incomes which are foregone (costs) when women remain at home (to look after their children). ¹³

Recent extensions to the theories of child-rearing have been built on the assumption that parents derive pleasure not only from the companionship of their children while the latter live at home, but also from the companionship and the accomplishments of their children when the latter become adults. A number of researchers, for example, have employed this assumption to derive hypotheses concerning the effects which parental behaviour will have upon the (adult) earnings and educational attainments of their children. Two articles which have reported success in employing this approach have recently been published by Fleisher and Rhodes¹⁴ and by Behrman and Taubman.¹⁵ Additional, indirect support for the hypothesis that parents value their children's adult accomplishments derives from the findings that as women's potential labour market incomes rise they have fewer children but spend more time and money on the education of each child. 16 The implication which is generally drawn from this observation is that women with high incomes substitute the benefits which they derive from the accomplishments of their children for the benefits which they could have derived from direct contact (companionship) with additional children.

To summarise, although conclusive empirical evidence has yet to accumulate, a consensus has begun to develop among researchers concerning the "demand" for children. According to this view, couples choose to have children if they perceive that the benefits to be derived from that choice exceed the costs. The relevant costs are of two types: the direct costs of feeding, clothing, and otherwise raising the child plus the indirect costs which arise when time which could have been spent elsewhere (for example, in work or leisure) is devoted to child-rearing. The benefits are of three major types: children can provide their parents with

¹¹ G. Becker, A Treatise on the Family (1981), pp. 96-97.

¹² M. Honig, AFDC Income, Recipient Rates, and Family Dissolution (1974), 9 J. Human Resources 303.

¹³ See the articles in (1973) 81 J. Political Economy, Supplement.

¹⁴ B. Fleisher and G. Rhodes, Fertility, Women's Wage Rates and Labor Supply (1979), 69 American Economic Rev. 14.

¹⁵ J. Behrman and P. Taubman, Birth Order, Schooling and Earnings (1986), 4. J. Labor Economics S121.

¹⁶ A. Leibowitz, Home Investments in Children (1974), 82 J. Political Economy, Supplement s111.

income, they can act as friends and companions, and they can offer their parents a source of pride in their accomplishments.

II. Valuing the Loss Suffered Upon the Death of a Child—The Theory

Two aspects of the theory developed in the preceding part are important to the estimation of the pecuniary loss suffered upon the death of a child. First, it was argued that couples will not choose to have children unless they perceive that the benefits to be derived from children equal or exceed the costs. This implies that an estimate of the cost of raising a child will act as a minimum valuation of the benefits which that child provides to its parents. For example, if the cost of raising a child to adulthood is \$150,000, and if couples only choose to have children if the benefits equal or exceed the costs, couples who choose to have a child must value the benefits produced by that child at a minimum of \$150,000. Indeed there is some precedent in both Canadian¹⁷ and American¹⁸ common law for the view that the benefits of "unwanted" children at least equal the costs. This leads one to suspect that consistency would require that the courts find that the benefits of "wanted" children considerably exceed the costs.

Second, it was argued in the preceding part that whereas most of the costs of raising children were incurred in the years during which the children remained in their parents' home, many of the benefits from children would be obtained after they had left home. What this implies is that, at most stages in a child's life, the benefits which the parents expect to obtain over the remaining years of its life will exceed the costs, even if lifetime benefits equal lifetime costs. For example, assume that the \$150,000 costs of raising a child are spread equally over the first twenty years of its life; that is, assume that those costs are \$7,500 per year. Assume also, for simplicity, that the benefits obtained from that child are expected to amount to \$5,000 per year for 30 years. If the child is killed at age twelve, the parents will "save" $(8 \times \$7,500 =) \$60,000$ in costs but will lose $(18 \times \$5,000 =) \$90,000$ in benefits.

It is these two factors in combination which make the loss suffered as a result of the death of a child "capable of a pecuniary estimate". From statistical sources concerning the average child, or from information provided by the plaintiffs, one can identify the costs of raising a child to adulthood. Using these costs as the basis of an estimate of the benefits obtained from the child, and by making an assumption concerning the manner in which benefits are distributed across the child's lifetime, an

Keats v. Pearce (1984), 48 Nfld. & P.E.I.R. 102, 142 A.P. 102 (Nfld. S.C.). (K. became pregnant after tubal ligation performed by P. failed. When she kept the baby, the court found that she had suffered no net damage.)

¹⁸ New York Times, Court Weighs Suit by Parents in Birth of Unsought Child (March 24, 1985), 1. (Facts identical to those in *Keats*, *ibid*.)

estimate can be derived of both the benefits and the costs which have been foregone. The difference between these estimates becomes the pecuniary estimate of the damages payable to the parents.

III. Valuing a First Child

In order to estimate the loss of value following the death of a child, it is necessary to calculate the present value of the costs of raising the child to maturity. In turn, this requires that estimates be made of both the direct expenditures on goods and services and the indirect costs which arise when the mother (or father) chooses to forego labour market earnings in order to care for the child. In this part, I will make an estimate of these costs for the average Canadian family, based upon the results of a number of studies which have been conducted since 1970. Employing a number of alternative assumptions concerning the manner in which the benefits from children are spread over their parents' lives, I will then estimate the average losses suffered when children are killed on each of their sixth, twelfth, and eighteenth birthdays. For purposes of analysis I will initially assume that the child in question is the first child of parents who are both twenty-two years old at the time of its birth and that the child will cease to be dependent upon its parents on its eighteenth birthday. I will subsequently consider the case of children other than the first born.

A large number of studies have been conducted, in many countries, in an attempt to estimate the direct costs of raising a child. These studies report their findings in one of two forms: either as an annual dollar cost or as a cost given as a percentage of parental income. Although significant differences can be found among the latter estimates, there is a cluster in the range of fifteen to twenty per cent of family income. Among middle income earners, for example, Espenshade¹⁹ estimates that the cost of the first child is 31.6 per cent of family income, van der Gaag²⁰ estimates that this cost is twenty-five per cent of family income, Olson²¹ estimates that it is twenty per cent of income, the United States Department of Agriculture²² estimates that it is approximately fifteen to twenty-five per cent of income, and Lazear and Michael estimate that it is sixteen per cent of family income.²³ Relying on these studies, I propose to assume that the direct costs of raising the first child are twenty per cent of family income.

¹⁹ T. Espenshade, The Cost of Children in Urban United States (1973).

²⁰ J. van der Gaag, On Measuring the Cost of Children (1982), 4 Children and Youth Services Rev. 77.

²¹ L. Olson, Costs of Children (1983), ch. 4.

²² C. Edwards, USDA Estimates of the Cost of Raising a Child: A Guide to Their Use and Interpretation (1981), Miscellaneous Publication Number 1411.

²³ E. Lazear and B. Michael, Estimating the Personal Distribution of Income with Adjustment for Within-Family Variation (1986), 4 J. Labor Economics S216.

TABLE I
Percentage of Family Expenditures
on Consumption Devoted to First Child

		Estimated Percentage Estimated Percentage				
	Family	of Category	of Total Consumption			
Expenditure Category	Expenditure (a)	Devoted to Child(b)	Devoted to Child			
	(1)	(2)	(3)			
Food	20.7%	25%	5.2%			
Shelter	22.7	15	3.4			
Household Operation	5.8	25	1.5			
Household Furnishings	4.9	10	0.5			
Clothing	8.4	20	1.7			
Transportation	16.3	20	3.3			
Health Care	2.6	30	0.8			
Personal Care	2.5	20	0.5			
Recreation	6.2	25	0.4			
Reading	0.7	15	0.1			
Education	1.0	30	0.3			
Tobacco and Alcohol	4.3	0	0			
Miscellaneous	3.9	15	0.6			
Total	100.0%		18.3%			

⁽a) Derived from Statistics Canada, Family Expenditure in Canada, 1982, No. 62-555, Table 8.

As a check on the appropriateness of this figure I have performed the calculations indicated in Table 1.²⁴ The first column of that Table identifies the manner in which the average Canadian family (of two or more persons) distributed its consumption expenditures among thirteen categories of goods and services in 1982. In the second column, I have estimated, on a conservative basis, the percentage of expenditures in each category which would be devoted to the first child. The figures in the first two columns have then been combined to produce column (3). The sum of the entries in that column, 18.3 per cent, represents a conservative estimate of the fraction of family consumption which is devoted to the first child.

There is also some evidence to indicate that expenditures vary with the age of the child. Relying on the studies cited in footnotes 19-22, 25 I propose to assume that the percentage of family consumption devoted to the first child is fifteen per cent from birth to age six, twenty per cent

⁽b) Estimates for food, clothing, and personal care were derived from: C. Bruce, Assessment of Personal Injury Damages (1985), Chapter 14. The remaining figures in column (2) are intended simply to represent conservative estimates of expenditures on the first child.

²⁴ Supra.

²⁵ Supra, p. 349.

from ages six to twelve, and twenty-five per cent from ages twelve to eighteen.

Increasingly, Canadian women are returning to the labour force before their youngest children are of school age. For this reason, I will assume that family income consists solely of the father's income until the child is four years old and that after that time it consists of the sum of the parents' incomes. For a measure of these incomes, I rely on Statistics Canada's publication, Income After Tax, Distributions by Size in Canada.²⁶ There it is reported that in 1982 average annual earnings, after tax, among individuals aged twenty-five to forty-four were \$19,590.50 for male and \$11.503 for females.

Thus, in the first four years of the child's life the father is assumed to earn $(4 \times \$19,590.50 =) \$78,362$ (in 1982 dollars), of which fifteen per cent, or \$11,754.30, is spent on the child. In the next two years, the mother and father earn $(2 \times (\$11,053 + \$19,590.50) =) \$61,287$, of which fifteen per cent, or \$9,193.05, is devoted to the child. When the child is between the ages of six and twelve the parents are assumed to earn $(6 \times (\$11,053 + \$19,590.50) =) \$183,861$, of which $(0.20 \times$ \$183,861 =) \$36,772.20 is spent on the child; and between the ages of twelve and eighteen the parents again earn \$183,861, of which $(0.25 \times$ \$183,861 =) \$45,965.25 is devoted to the child. Direct expenditures over the child's entire lifetime, therefore, are estimated to amount to \$103,684.80. To this must be added the mother's foregone earnings during the child's first four years, here estimated to be $(4 \times \$11.053 =)$ \$44,212, to produce a total cost of \$147,896.80 (in 1982 dollars). Finally, to convert this figure into a 1985 equivalent, I multiply by fifteen per cent—the approximate increase in weekly wages and salaries between 1982 and 1985²⁷—to obtain a figure of \$170,081.32, or approximately \$170,000.28

The results of the calculations in the preceding paragraph have been summarised in the first seven columns of Table 2.²⁹ In addition, the last two columns of Table 2 report the cumulative expenditures at various ages, in both 1982 and 1985 dollars. For example, the \$65,159.35 figure in the second last column indicates that that was the cost of raising a child to age six in 1982. The comparable figure in the last column then indi-

²⁶ (1982) Cat. No. 13-120, October 1984.

²⁷ Source: Statistics Canada, Employment, Earnings, and Hours (various issues), Cat. No. 71-002.

²⁸ For simplicity, I have assumed that the net discount rate of growth of the parents' salaries over the child's lifetime equals the rate of interest - not an unreasonable assumption in Canada. (See C.J. Bruce, Assistant of Personal Injury Damages (1985), chapters 5 and 9).

²⁹ Infra, p. 352.

TABLE 2
Estimated Cost of Raising First Child: Canada, 1982 and 1985^a

Family Income			Percentage	Direct	Mother's	Total	Cumulative	Cumulative		
	Age of				Devoted	Expenditures	Foregone	Expenditures	Expenditures in	Expenditures in
_	Child	Mother	Father	Total	to Child	on Child	Earnings	on Child	"1982 Dollars"	"1985 Dollars"
	0-4		\$ 78,362	\$ 78,362	15	\$11,754.30	\$44,212	\$55,966.30	\$ 55,966,30	\$ 64,361.25
	4-6	\$22,106	39,181	61,287	-15	9,193.05		9,193.05	65,159.35	74,933. 25
	6-12	66,318	117,543	183,861	20	36,772.20		36,772.20	101,931.55	117,221.28
	12-18	66,318	117,543	183,861	25	45,965.25		45,965.20	147,896.80	170,081.32

^a See the text, supra, p. 351, for the derivation of the figures in this Table.

TABLE 3

Pecuniary Loss Resulting from the Death of a First Child, Under Alternative Assumptions About Benefits

ASSUMP	AGE OF CHILD AT DEATH				
Distribution of Benefits Over Lifetime	Ratio of Benefits to Costs	6	12	18	
<u> </u>	Benefits Equal to Costs	\$ 66,993	\$100,254	\$142,848	
Constant Annual Value	Benefits Exceed Costs by 25%	107,865	138,532	178,560	
25% of Benefits Obtained	Benefits Equal to Costs	39,625	39,857	42,500	
After Child Leaves Home	Benefits Exceed Costs by 25%	73,326	63,019	53,125	

cates that this cost had risen to \$74,933.25, or approximately \$75,000, by \$1985.

In order to obtain the loss of benefits following the death of a child, the cost data outlined in Table 2 must be combined with assumptions concerning both the ratio of expected benefits to costs and the manner in which those benefits are distributed across the child's life. Initially, I will assume that benefits exactly equal costs and that the annual value of the benefits derived by the parents is constant over the duration of the child's life. ³⁰ As the average Canadian woman has a life expectancy of fifty-eight years at age twenty-two³¹ (the assumed age at which her child is born), I will assume that the number of years over which the child will provide benefits to its parents is fifty-eight. Thus, as the present value of the cost of raising a child for eighteen years has been estimated to be approximately \$170,000 at the time of birth, and as the present value of lifetime benefits is assumed to equal that cost, average annual benefits are found to be \$6,000 (in 1985 dollars). ³²

This implies that if the child dies on its eighteenth birthday, the parents will have paid for all of the costs of its upbringing but will yet to have received the present value of \$6,000 per year over forty years. This figure, which proves to be \$142,848, 33 represents the first estimate of the loss suffered by parents if their first child dies on its eighteenth birthday. It is reproduced in the first row of Table 3, against the heading "Constant Annual Value—Benefits Equal to Costs". Similar calculations have been made with respect to children dying on their sixth and twelfth birthdays, except that in those cases the future costs which have been "saved" have been deducted from the future benefits which have been lost. In the case of the child killed on its sixth birthday, for example, costs "saved" are (\$170,081 - \$74,933 =)\$95,148 whereas the present value of benefits lost is \$162,411. Thus the net loss is estimated to be \$66,993.

Instead of assuming that the benefits provided by children are spread evenly over their lives, it might be more reasonable to assume that parents derive greater benefits while their children are living with them than they do after the children have left home. For purposes of illustration, I have

³⁰ The Gallup Poll reports that parents' satisfaction with their relations with their children remains virtually unchanged over their lifetime. In a 1981 poll, 76 per cent of those 18-29, 80 per cent of those 30-49, 83 per cent of those 50-64, and 81 per cent of those 65 years and over reported that they were highly satisfied with their relations with their children. (George Gallup, The Gallup Poll: Public Opinion 1982 (1983), p. 16).

³¹ Statistics Canada, Life Tables, Canada and the Provinces 1980-1982 (1984), Cat. No. 84-532, p. 18.

³² This figure has been derived under the assumptions that the nominal value of benefits increases at the rate of inflation of the consumer price index and that the real discount rate is 3.0 per cent.

³³ The real discount rate applied to obtain this figure is 3.0 per cent.

calculated the effect of assuming that twenty-five per cent of the benefits from the child are obtained after it leaves home and that the remaining benefits are spread evenly over the eighteen years the child is at home. In this case, annual benefits are \$8,961 per year while the child is at home and \$42,500 during the entire period after it has left home. Under this assumption, parents lose benefits of \$42,500 if an eighteen year-old child dies and (\$92,273 + \$42,500 - \$95,148 =) \$39,625 if a six year-old child dies. These figures and the comparable figure for a twelve year-old child are reported in the third row of Table 3.³⁴

In the introduction to this part, I noted that a number of recent decisions of the Canadian and American courts have suggested that the benefits provided by "unwanted" children at least equalled the costs. If this is the case, one might reasonably assume that the benefits of a "wanted" child would exceed the costs. In this light, I have repeated the calculations in Table 3 on the assumption that lifetime benefits exceed lifetime costs by twenty-five per cent; that is, on the assumption that the present value of lifetime benefits was $(\$170,000 \times 1.25 =) \$212,500$. The results of these calculations are reported in the second and fourth rows of Table 3.

IV. Valuation of Second and Subsequent Children

It is a commonplace that the second child, and any subsequent child, will be less expensive to raise than the first. Thus, if the model developed in this paper is applied *pari passu* to the valuation of second and subsequent children, one will find that that value is less than was estimated for the first child. Although the courts may well be reluctant to award lower damages for the loss of the second than the first child, it will prove useful to compare the two valuations.

Two differences arise between the costs of raising the first and second child. First, the direct costs of raising the second child are often lower than those for the first because many of the items purchased for the first—such as baby furniture or a larger car or house—can be shared by the second. Second, assume that women plan to return to the labour force when their youngest children are four years old. If they have only one child, they will have to remain out of the labour force for four years. If they have a second child two years later, they will have to extend that stay out of the labour force for that two years. In this case, the indirect cost of the second child is the value of the mother's wages for only two years.

Of those studies which have been completed in the last ten years, most appear to support the conclusion that the second child costs about two-thirds as much as the first. Olson,³⁵ for example, found that the

³⁴ Supra, p. 352.

³⁵ *Op. cit.*, footnote 21.

second child cost sixty-nine per cent as much as the first; Muellbauer³⁶ found that this ratio generally fell between forty-four and ninety per cent (depending upon age and parent's income); and van der Gaag and Smolensky³⁷ found that it fell between seventy-five per cent and one hundred and twenty-five per cent for children over six. (For children under six they found that the first child cost the parents nothing.) Applying this assumption to the income figures employed in Table 2,³⁸ and assuming that the mother increases her stay out of the labour force for only two years when she has a second child, I have derived Tables 4 and 5,³⁹ which are analogous to Tables 2 and 3,⁴⁰ respectively. As is to be expected from the assumptions which have been made, the losses for a second child, reported in Table 5, are approximately sixty per cent of those for a first child, reported in Table 3.

V. Two Caveats

A. Loss of Support

It is important to note that the valuations in Tables 3 and 5 do not incorporate an element for loss of financial support. If evidence is led which indicates that the child would have provided financial support to the parents, or that the child would have offered services which the parents would normally have had to purchase in the market—such as helping in the parents' store or offering the parents accommodation in the child's home—it may be appropriate to increase damages to account for the loss of those benefits. On the other hand, if no such evidence is led. the courts must be wary of any claim that children in general provide support to their parents. Statistics Canada reports, for example, that in 1982 the average family headed by males younger than forty-five devoted less than 2.5 per cent of its expenditures (that is, less than \$725 per year) to gifts and contributions to family members outside the spending unit; that families headed by males between the ages of forty-five and sixtyfive devoted less than 4.5 per cent of expenditures (\$1,200) to such contributions; and that families headed by males over sixty-five received less than 1.7 per cent of their incomes (that is, less than \$460 per year) in the form of "other money receipts". In short, Canadians, on average, do not appear to devote a significant portion of their incomes to the support of individuals outside the immediate family units

³⁶ J. Muellbauer, Testing the Barten Model of Household Composition Effects and the Cost of Children (1977), 97 The Economic J. 460.

³⁷ J. van der Gaag and E. Smolensky, True Household Equivalence Scales and Characteristics of the Poor in the United States (1982), 28 Rev. Income and Wealth 17.

³⁸ Supra, p. 352.

 ³⁹ Infra, p. 356.
 40 Supra, p. 352.

TABLE 4
Estimated Cost of Raising Second Child: Canada, 1982 and 1985

		Family Income	•	Percentage	Direct	Mother's	Total	Cumulative	Cumulative
Age of				Devoted	Expenditures	Foregone	Expenditures	Expenditures in	Expenditures in
Child	Mother	Father	Total	to Child	on Child	Earnings	on Child	"1982 Dollars"	"1985 Dollars"
0-4		\$ 78,362	\$ 78,362	10	\$ 7,836	\$22,106	\$29,942	\$29,942	\$ 34,433
4-6	\$22,106	39,181	61,287	10	6,129		6,129	36,071	41,482
6-12	66,318	117,543	183,861	13	23,902		23,902	59,973	68,969
12-18	66,318	117,543	183,861	17	31,256		31,256	91,229	104,913

TABLE 5

Pecuniary Loss Resulting from the Death of a Second Child, Under Alternative Assumptions About Benefits

ASSUMPTIONS		AGE OF CHILD AT DEAT			
Distribution of Benefits Over Lifetime	Ratio of Benefits to Costs	6	12	18	
Constant Annual Value	Benefits Equal to Costs	\$ 36,885	\$58,629	\$ 88,232	
Constant Annual Value	Benefits Exceed Costs			•	
	by 25%	61,977	82,286	110,302	
	Benefits Equal to Costs	19,792	21,302	26,228	
25% of Benefits Obtained After Child Leaves Home	Benefits Exceed Costs by 25%	40,600	35,615	32,785	

B. Mitigation

The analysis of parts II, III and IV assumes that the parents will be unable to mitigate their damages by having another child. If the court requires that this form of mitigation be undertaken, what is the appropriate measure of damages? First, the calculations of parts III and IV suggest that the costs of raising a child may exceed the benefits, particularly in the early years of the child's life. For example, in part III, I showed that when it was assumed that lifetime benefits equalled lifetime costs and that benefits were spread evenly over all years of the parents' lives, the average annual benefit of a first child could be estimated to be \$6,000. Furthermore, in Table 2, 41 I estimated that the total cost of raising a child to its sixth birthday was \$74,933.25. Thus, if the parents were required to "start again" they would have suffered a net loss of \$74,933.25 – $(6 \times \$6,000) = \$38,933.25$.

In addition, the parents may incur greater costs raising the "replaced" child than they did raising the child who was killed. For example, if the mother had returned to work following the birth of the first child, she may have increased her real earnings above those which were available to her at the time she had her first child. Thus, the cost to her of staying home to raise the "replaced" child would exceed the cost of raising the first child. When these costs are added to the net loss calculated in the preceding paragraph, the total losses associated with the death of a child may not differ significantly from those which were reported in Tables 3 and 5.42

Conclusion

The purpose of this article has been to suggest that damages upon the death of a child are "capable of a pecuniary estimate". The method which was devised for constructing this estimate was applied to the valuation of the loss which the "average" Canadian family would suffer if a first or second child was to be killed upon its sixth, twelfth or eighteenth birthday. The results of that valuation indicate that the loss following the death of a first child falls between \$39,625 and \$178,560, and following the death of a second child between \$19,792 and \$110,302, depending upon the age of the child and upon various assumptions made about the benefits which parents derive from their children.

To conclude the article, it may be of interest to compare the damage estimates reported in Tables 3 and 5^{43} with recent awards made by the

⁴¹ Supra, p. 352.

⁴² Supra, pp. 352, 356. The correspondence between the losses reported in Tables 3 and 5 and those calculated under the mitigation assumption will be closer, the younger is the deceased child. However, the courts are more likely to require mitigation, the younger is the deceased.

⁴³ Ibid.

TABLE 6

Recent Canadian Decisions Concerning Damages
Arising from the Wrongful Death of a Child

	Dec	eased		Damages to:		
Citation	Age	Sex	Parents	Other Family Members	Family in Total	
Fraser v. Young (1983), 19 A.C.W.S. (2d) 136 (Ont. Co. Ct.)	13	Male	\$10,000	\$10,500	\$20,500	
Hatlen v. Kaps Transport (1983), 49 A.R. 98 (Alta. Q.B.)	13	Male	10,000		10,000	
Hutcheson v. Harcourt I.L.R. 20 A.C.W.S. (2d) 477 (Ont. C.A.)	Adult	Male	10,000	3,000	13,000	
Jagt's Estate and Smith v. Isnor and Phelan (1983), 133 A.P.R. 274, 61 N.S.R. (2d) 274 (N.S.S.C.)	17	Male	8,000		8,000	
Kinnons' Estate v. Traynor and Pole (1982), 46 A.R. 75 (Alta. Q.B.)	15	Female	15,000		15,000	
Lloyd Estate v. Ruel and Ruel (1983), 100 A.P.R. 270, 38 N.B.R. (2d) 270 (N.B.Q.B.)	16	Male	8,000		8,000	
Marcoux et al. v. Lacoursiere (1983), 21 A.C.W.S. (2d) 194 (Ont. H.C.)	17	Male	15,000	5,000	20,000	
Mason v. Peters (1982), 39 O.R. (2d) 27 (Ont. C.A.)	11	Male	45,000	5,000	50,000	
Morrissette. Salagubas and Hosaluk (1984), 32 Sask. R. 25 (Sask. Q.B.)	13	Male	6,000		6,000	
Wessel v. Kinsmen Club (1982), 37 O.R. (2d) 481 (Ont. H.C.)	15	Male	8,000	9,600	17,600	

Canadian courts. For this purpose, I propose to employ as my basis for comparison the figures in the fourth rows of Tables 3 and 5 as it is my subjective view that they embody the most realistic sets of assumptions about benefits. Those figures suggest that damages should be valued at approximately \$60,000 following the death of the family's first child, and at approximately \$35,000 following the death of any other child.

With few exceptions, these figures exceed the damages which have been awarded by the Canadian courts, but do not lie outside the range which the courts have found ''acceptable''. Table 6⁴⁴ summarises the findings in ten recent claims arising from the death of a child. There it is seen that total damages (excluding special damages for medical and funeral expenses) varied from \$6,000 to \$50,000. Accordingly, I would suggest that evidence based upon the approach outlined here might well be considered by the courts to be useful information for the purposes of damage assessment.

⁴⁴ Supra, p. 358.