Driver Education and Safety

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The relationship between driver education and safety can be stated briefly in a simple sentence. However, since the statement is not palatable to most people, a great deal of material and data often is presented to support the sentence.

There is no causal relationship between driver education and safety. It is as simple as that. I am talking about driver education as it appears in its most common form as a course that is taken in high school. “Safety” in its most relevant meaning here is the avoidance of personal injury and property damage by drivers.

As unpleasant as it may be to all of us, the plain, hard facts are that driver education as generally taught in Indiana and in the United States has no cause and effect relationship on the frequency of automobile accidents. (I make that statement as one who has spent his professional life devoted to the study of cause and effect relationships in the behavioral sciences including such fields as psychology, education, sociology, medicine, speech, physical education, child development, statistics, research design, and measurement.) I have reviewed all the research literature I could find and run a number of studies myself in the area of driver education in the last five years. My conclusion is inevitably the same. There is no reduction in automobile accidents as the result of taking driver education in high school.

Yes, there is a relationship between taking driver education and a reduction in the frequency of automobile accidents. This can be readily demonstrated by a survey of insurance company data and their rate reduction for young people who have had driver education. If one were to run the files of a state drivers’ licensing agency through a computer—as has been done for half a million people in the State of Illinois, you would indeed find that people who had driver education have fewer accidents. This correlation does exist. However, one of the first things I tell students in research design courses is a well known rule in the behavioral sciences, “Correlation is not necessarily

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causation.” Behavioral scientists are much like police investigators. Their job is to be suspicious and to dig beneath the surface. All is not necessarily what it may seem to be.

After looking at this correlation between accidents and driver education for a number of years and hearing all kinds of prestigious people and institutions proclaim its worth, I finally decided to dig beneath the surface just a little. I had access to some data on high school seniors from all over the United States. These students had reported on the courses they had taken, including driver education, their interests and activities, their family backgrounds, and they took a large number of tests as well.

Some interesting results occurred. There were a number of correlations with taking driver education or not taking it.

Students who took driver education knew more about literature, music, social studies, mathematics, and the biological sciences! Further they had higher scores on the intelligence test and had parents who were somewhat better educated and well to do than the parents of students who did not take driver education. These driver education students started earning money at a younger age, had fewer dates per week, had more semesters of foreign language, and more planned to go on to college and to graduate and professional school than the students who did not take driver education. If we accept as cause and effect the take-driver-education, fewer accidents relationship; then we must also accept all of these relationships as well. A truly remarkable course this driver education! With just thirty hours of classroom work and six hours behind the wheel not only are your insurance rates and accidents reduced, but your I.Q. goes up, you are more likely to go to college, and your knowledge of languages, science, the arts, and literature is enhanced.

There was also unfortunately one bothersome aspect about these data. There wasn’t any relationship between taking driver education and automobile accidents (in the first year these students were out of high school)! How could this be? Everybody knows there is a relationship between auto accidents and taking driver training. This is a well documented fact. And not just college professors talk about this fact. This fact really does exist. Don’t insurance companies give you a discount? Didn’t the Congress pass a law making driver education compulsory? Don’t many states require driver education to get a driver’s license early? Don’t all the big automobile manufacturers support driver education by giving the schools cars? Aren’t there full page ads in national magazines telling all of us to get our schools to
give driver education? Aren't there any lasting values in American society anymore? I mean that it was popular a few years ago to question whether God was dead, the omniscience of college professors has long since been denounced, anarchy is now seriously put forth as a replacement for democracy; but everybody knows that driver education correlates with fewer accidents.

It was getting to the point where I almost started to question computers. But even the Purdue football coaches use computers. And with the results they've been getting, who was I to be a doubter? So I thought about the data a long time. Finally, it came to me. I had studied only high school seniors. Insurance companies and state licensing agencies study everybody. Further, I had spent my own money for the data, ran it myself, and used only a few minutes of computer time, since I was paying for it myself and could afford to pay for only a very few subjects, 600 or so.

So I changed my ways, before all the eternal verities came crashing down. I got a small grant to pay for the data and a graduate assistant. I got 6,000 subjects. I stole over 20 hours of computer time and even beat out some of the engineering schools in computer usage one month. I still got a zero relationship between taking driver education and automobile accidents.

I could only conclude that just maybe something about getting to be a senior in high school versus never getting to be a senior, e.g. dropping out, had something to do with how many automobile accidents you had. It was also becoming apparent that students who took driver education came from somewhat better off communities that could afford to offer driver education in their schools. I also knew that socio-economic factors are related to automobile accidents. Insurance companies consider as preferred risks professional and semi-professional people, government employees, teachers, and most skilled workers. High school graduation is required for most of these jobs. Insurance companies also know that "A" students and those on the honor roll are preferred risks.

Could this then be the relationship? Is it the more intelligent, harder working, stable students who will have more permanent jobs, those that will think ahead and are perhaps more courteous, who will have fewer accidents and had driver training more available to them and, believing it socially desirable, take the course? They also are perhaps less likely to be high school dropouts, hate society and fight it, be emotionally less overwrought, suicidal, and alcoholics. All of these are well known manifestations of drivers in fatal accidents.
I had one last thought though. In my U.S. sample I had Indiana youngsters identified. Certainly, if any group would act according to all the laws of common sense, it would be Indiana boys and girls. (We native Hoosiers have almost infinite faith in our institutions and people.) Alas, even here I must report that there is no significant relationship. These data are as follows:

<table>
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<th>Accident Group</th>
<th>No Accident Group</th>
<th>Total</th>
</tr>
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<tr>
<td>Took Driver Education</td>
<td>45</td>
<td>42</td>
<td>87</td>
</tr>
<tr>
<td>Did Not Take Driver Education</td>
<td>24</td>
<td>18</td>
<td>42</td>
</tr>
<tr>
<td>Total</td>
<td>69</td>
<td>60</td>
<td>129</td>
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</table>

<table>
<thead>
<tr>
<th>GIRLS</th>
<th>Accident Group</th>
<th>No Accident Group</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Took Driver Education</td>
<td>11</td>
<td>55</td>
<td>66</td>
</tr>
<tr>
<td>Did Not Take Driver Education</td>
<td>7</td>
<td>22</td>
<td>29</td>
</tr>
<tr>
<td>Total</td>
<td>18</td>
<td>77</td>
<td>95</td>
</tr>
</tbody>
</table>

Now I ask you, what has happened to our country when the automobile and insurance companies, the National Education Association, the United States Congress, state superintendents of public instruction, state safety officials, and the U. S. Department of Transportation strongly support the course of driver education and many support it very well financially? Even in Indiana we spend over $3,500,000 a year on salaries of driver education teachers alone. This is to say nothing of the cost of the cars involved or the support of the colleges that offer the course work to certify teachers in this field. (I suspect that even some of you may have given driver education lip service once in a while.)

Is our nation gripped in the vice of massive delusions? Do we mimic the savages who dance and beat on tom-toms to bring rain? Even our doctors don’t bleed patients with pneumonia anymore. Just because they killed George Washington with bleeding doesn’t mean that they’re going to treat you with the same old methods. Someone in medicine probably collected a little data at one time about the quacks who didn’t practice modern medicine and thus didn’t bleed patients. They were startled at the results, but our great universities held firm.
The Johns Hopkins University Medical School and Hospital didn’t finally give up bleeding until the 1890’s.

I, too, have collected a little data. I, too, hold firm. I think that driver education in the high school is now the major answer to the highway death toll. The highway engineers over the past seventy years have designed and built the safest highways that it is possible for money to buy. The automotive engineers (with a little help from Ralph Nader) have designed and built cars so safe that it is estimated that less than 5 percent of accidents have as a major factor mechanical failures. The engineers have done their job very well.

Now the time has come to do something about the drivers. There are only two ways to change human behavior—education and punishment. Education is less traumatic. We know that the high school and post high school age group have automobile accidents and death rates far out of proportion to their numbers. The high school is the ideal place to educate drivers in these age groups.

However, while I want medical treatment by physicians when I’m sick, I want a medical practice based on hard evidence and scientific theory. So, too, I want similar driver education in high school. Again I want the educational practices to be based on hard evidence and demonstrated effectiveness. This has not been done. It needs to be done. It must be done. I am convinced this is the major answer to the slaughter, agony, and horrendous property damage that automobile accidents now cause.