Safeguarding Youth Interrogation Rights: The Effect of Grade Level and Reading Complexity of Youth Waiver Forms on the Comprehension of Legal Rights

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Summary: The extent to which youths understand their interrogation rights was examined. High school students (N = 160) from five different grades were presented with one of two Canadian youth waiver forms—varying widely in reading complexity—and tested on their knowledge of their legal rights. Results showed that comprehension of both waiver forms was equally deficient, and systematic misunderstandings of vital legal rights were discovered (e.g., the right to remain silent). There was also a positive linear relationship between high school grade level and amount of comprehension. Potential ways to enhance youths’ understanding of their rights and provide them protection during interrogations are discussed. Copyright © 2014 John Wiley & Sons, Ltd.

It has been argued convincingly that youths are vulnerable individuals who should be treated cautiously by police officers during an interrogation (Steinberg & Scott, 2003). Youths generally lack the cognitive skills required to navigate a standard interrogation environment (Leo, 1996) and are thus at risk to comply with the requests of authority figures and take responsibility for crimes they did not commit (Owen-Kostelnik, Reppucci, & Meyer, 2006; Redlich & Goodman, 2003). In recognition of such concerns, many countries have afforded enhanced legal protections to youths (e.g., Canadian Youth Criminal Justice Act (YCJA), 2002; J. D.B. v. North Carolina, 2011; Police and Criminal Evidence Act, 1984). However, a body of international research has increasingly called the effectiveness of these enhanced legal protections into question because of an inability of youths to properly understand and exercise these rights (Cooke & Philip, 1998; Eastwood, Snook, & Luther, 2012; Goldstein, Condie, Kalbleitzer, Osman, & Geier, 2003; Grisso, 1981).

A formative study in the area of legal right comprehension by Grisso (1981) found that only 21% of juveniles in the USA fully understood a Miranda warning that was presented to them. Subsequent research in Scotland, the USA, and Canada confirmed that youths failed to comprehend their legal rights and—in line with what is known about brain maturation processes (Yurgelun-Todd, 2007)—that younger youths tend to exhibit the lowest levels of understanding (e.g., Abramovitch, Peterson-Badali, & Rohan, 1995; Cooke & Philip, 1998; Goldstein et al., 2003; McLachlan, Roesch, & Douglas, 2011; Viljoen, Zapf, & Roesch, 2007). In an initial preliminary test of the comprehensibility of Canadian youth waiver forms—which contained the enhanced protections provided by the YCJA—Eastwood et al. (2012; Study 2) presented a single waiver form to a sample of high school students. Results showed that the students recalled, on average, 40% of their legal rights, and only 22% of the youths comprehended more than 50% of their rights. It should be noted that this issue is not unique to youth populations, as similar low levels of comprehension have been discovered with adult cautions as well (Cloud, Shepherd, NodvinBarkoff, & Shur, 2002; Eastwood, Snook, & Chaulk, 2010; Fenner, Gudjonsson, & Clare, 2002; Gudjonsson, 1991).

One leading explanation for the ubiquitous lack of comprehension pertains to the structure and wording of the documents used to deliver the legal rights (Gudjonsson, 1991; Rogers, 2008). For example, an analysis of juvenile Miranda warnings in the USA by Rogers et al. (2012) found that nearly half of the 371 juvenile warnings they analyzed were excessively long (i.e., >225 words) or had a passage written at a college reading level. Eastwood et al. (2012; Study 1) also analyzed the complexity of youth waiver forms in use by Canadian police organizations and found that 80% of the forms contained at least one section that required a post-secondary reading level to comprehend, and each form contained, on average, 23 difficult words (i.e., more than a Grade 7 level of education was needed to comprehend the word). There was also a wide variation in complexity between waiver forms from different organizations (e.g., overall reading levels ranged from Grade 6 to Grade 12), which raises questions about differences in the safeguarding of youth legal rights across jurisdictions. Such findings suggest that the well-intentioned safeguards are likely to be ineffective in ensuring that the youths comprehend their rights because the wording of the forms being used to deliver the rights is often excessively complex.

The broad purpose of the current study was to replicate Study 2 of Eastwood et al. (2012), which examined how well youths understood their rights that were administered via waiver forms. We extend this study by examining the extent to which variations in youths’ intellectual capacities (as captured by age and grade level) and variations in waiver complexity impact comprehension. Specifically, we predict that (i) comprehension will increase with increasing grade level; (ii) comprehension will increase with decreasing complexity of youth waiver forms; and (iii) less than half of the information contained in the waiver forms will be comprehended.
METHOD

Participants

Participants (N = 160) were students attending a high school in Montreal, Canada. The final sample consisted of 20 young men and 21 young women in Grade 7 (M_\text{age} = 12.34 years, SD = 0.48 years), 22 young men and 34 young women in Grade 8 (M_\text{age} = 13.41 years, SD = 0.50 years), 11 young men and 8 young women in Grade 9 (M_\text{age} = 14.26 years, SD = 0.56 years), 19 young men and 16 young women in Grade 10 (M_\text{age} = 15.46 years, SD = 0.56 years), and 6 young men and 3 young women in Grade 11 (M_\text{age} = 16.56 years, SD = 0.53 years). In terms of self-reported ethnicity, the sample consisted of 77 Caucasians (48%), 29 Asians (18%), 28 (18%) participants who chose the option of other, and 26 Blacks (16%). Thirty-two participants (20%) reported hearing or reading a waiver form at some point previous to the study.

Materials

The materials included (i) a parental consent form; (ii) a youth consent form; (iii) a demographic questionnaire that asked youth to provide their age, ethnicity, grade level, gender, and indicate if they had ever read or heard a waiver form; (iv) a booklet that contained one of the two waiver forms; and (v) a booklet that contained the free recall and five multiple-choice questions. The waiver forms contained in the first booklet were those being used by the Royal Canadian Mounted Police (RCMP) in Charlottetown, Prince Edward Island (low complexity) and the Orangeville Police Service in Ontario (high complexity).1 The waivers were selected on the basis of their reading complexity level, including their Flesch–Kincaid (FK) grade level score, Grammatik sentence complexity score, use of difficult and infrequent and difficult words, and overall length (see Eastwood et al., 2012, for more details on these measures). As used in the current study, the RCMP-Charlottetown form—compared with the Orangeville form—had a much lower overall FK score (6.1 vs. 11.2), a much lower Grammatik score (41 vs. 90), used less than half as many difficult and infrequent words (14 vs. 32), and was shorter in overall length (519 vs. 602 words).

Design

A 2 (complexity level: low versus high) × 5 (grade: 7, 8, 9, 10, 11) between-participants design was used. However, because of logistical constraints, an incomplete factorial design emerged because there was an absence of participants in both the Grade 9-high complexity and Grade 11-high complexity conditions. Three dependent variables were used to measure participants’ comprehension of their legal rights. The first variable was the overall percentage of information recalled correctly from the form. As the structure and content of the two forms differed from each other, two different coding guides were used for the RCMP-Charlottetown (29 variables) and Orangeville (33 variables) waiver forms. Participants were given one point for each variable they mentioned correctly in their free recall. Second, given that the ultimate purpose of waiver forms is to convey the youths’ legal rights, recall of the five major broad rights afforded to youths as contained in the YCJA and relevant case law was assessed: (i) the youth have no obligation to make a statement; (ii) any statement that is made may be used as evidence against them in court; (iii) the youth have the right to consult a lawyer and/or an appropriate adult at any point; (iv) any statement must be made in the presence of the contacted lawyer/appropriate adult unless desired otherwise; and (v) the youth have access to free legal advice if desired. This variable was also calculated by coding the free recall responses. The third dependent variable was the participants’ answers to the multiple-choice questions that tested the same five legal rights (a coding guide for the free recall and the wording of the multiple-choice questions can be obtained from the corresponding author).

Procedure

Upon receiving parental and student consent, testing began in classrooms containing 25 to 35 single desks. Participants first completed the demographic questionnaire. They were then given the first booklet, and the first author read the legal rights aloud as the students followed along.2 At the end of each section, participants were asked to report if they understood what was just read by circling either ‘yes’ or ‘no’ in the appropriate place in their booklet. The second booklet was distributed after the first booklet was collected. Participants were asked to record, in the space provided, everything that they could remember about their rights as mentioned in the waiver form that they had just received and then answer the multiple-choice questions. Last, participants were debriefed, and any questions regarding the study were answered. The study took approximately 20 minutes to complete.

Reliability analysis

A research assistant coded all the participants’ answers independently of the first author. The overall kappa value for the RCMP-Charlottetown waiver was .80 (overall per cent agreement was 94.49%), and the overall kappa value for the Orangeville waiver was .79 (overall per cent agreement was 95.82%). These values suggest acceptable agreement between the coders (Fleiss, 1981; Landis & Koch, 1977).

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1 Modifications were made to the structure of the waiver forms in order to make them suitable for the current study. Modifications included removing information that was only relevant to certain age groups (e.g., some information in the form would only be read to 16- to 17-year-old youths), including only one section if two mutually exclusive options are given (e.g., if youth answers ‘yes’ read section A, if ‘no’ read section B), and any direct questions (e.g., do you wish to make a statement). The modifications led to a reduction of 429 words for the RCMP-Charlottown form and 219 words for the Orangeville form, as compared with the longest possible version of the form that a youth could face (Eastwood et al., 2012). No information directly relevant to the rights afforded to youths was modified.

2 The exact way in which rights are delivered to youths is left to the discretion of individual officers, and informal conversations with officers suggest that some simply read the waiver forms aloud to youths, whereas others have them follow along on a written copy. In order to maximize the ability to participants to comprehend the information in the forms, we choose the latter approach in the current study (Chang, 2009).
RESULTS

The average percentage of information in the waiver forms that was recalled correctly was 14.53% (SD = 10.13). The maximum percentage of information recalled correctly was 57.58%, which was achieved by one participant. More than 30% of the information in the waiver form was recalled by 6.88% of the participants. The mean percentage of total waiver information recalled for all conditions is shown in Table 1. A comparison of the two forms revealed that information in the low complexity form was more easily recalled than information in the high complexity waiver form, $d = 0.49$. A comparison across the grade levels revealed medium effect sizes for Grade 10 compared with Grades 7 ($d = 0.58$) and 9 ($d = 0.55$), and for Grade 11 compared with Grades 7 ($d = 0.67$), 8 ($d = 0.50$), and 9 ($d = 0.65$). Given the absence of two grade levels in the high complexity waiver condition, we chose to inspect the effect of grade level across the low complexity waiver and found that the effect of grade level did not reach significance, $F(4, 97) = 2.32, p = .062$. However, there was a significant positive correlation between grade and recall, $r = .23, p = .004$. Gender, ethnicity, and previous waiver form exposure had no significant effect on the dependent variables.

The mean number of the five main rights recalled for all conditions is also shown in Table 1. All five rights were recalled correctly by 1.25% of the participants, and 26.88% of the participants recalled three or more rights correctly. Right 1 (i.e., no obligation to make statement), Right 4 (i.e., statement must be made in the presence of contacted lawyer/appropriate adult unless desired otherwise), and Right 5 (i.e., access to free legal advice) were all recalled correctly by less than 40% of the students. A comparison of the two forms revealed no difference in recall level, $d = 0.03$. A comparison across the grade levels revealed medium effect sizes for Grade 10 compared with Grades 7 ($d = 0.74$), 8 ($d = 0.58$), and 9 ($d = 1.08$), and for Grade 11 compared with Grade 9 ($d = 0.65$). Focusing only on the low complexity waiver, a significant effect of grade level on recall was found, $F(4, 97) = 3.34, p = .013$. There was also a significant positive correlation between grade and recall, $r = .21, p = .007$.

An examination of the answers to the multiple-choice questions revealed that 26.25% of the participants answered all five questions correctly, and 69.38% answered three or more questions correctly. Participants struggled to understand Rights 1 (i.e., no obligation to make statement; 51.25%) and 4 (i.e., statement must be made in presence of contacted lawyer/appropriate adult unless desired otherwise; 52.50%) more than Rights 2 (i.e., statement could be used as evidence; 88.75%), 3 (i.e., right to consult lawyer/appropriate adult; 69.38%) and 5 (i.e., access to free legal advice; 68.13%). There was no difference between the forms in average amount of questions answered correctly, $d = 0.00$. A comparison across the grade levels revealed medium effect sizes for Grade 8 compared with Grades 9 ($d = 0.64$) and 10 ($d = 0.57$).

In terms of self-reported belief in comprehension, 48.75% of participants reported understanding all the sections in their waiver form, and 81.88% of individuals claimed to understand the majority of the sections (i.e., 9 out of 11). Across all the sections in both waiver forms, participants answered ‘yes’ to the question of whether or not they understood the information 89.09% of the time. There was a significant negative correlation between the self-reported level of comprehension and overall comprehension ($r = -.23, p = .003$), and a significant positive correlation between self-reported comprehension and both correct recall of main rights ($r = .25, p = .001$), and correct answers to the multiple-choice questions ($r = .23, p = .003$).

DISCUSSION

We tested youths’ comprehension of Canadian youth waiver forms and examined the effect of grade level and waiver complexity on comprehension levels. Our findings revealed that recall of legal rights increased with increasing grade level. In addition, the average level of comprehension was very low and varied little as a function of waiver complexity. Our data also show that there are some disturbing misconceptions that youths held regarding their interrogation rights.
Although we found low levels of comprehension, participants reported uniformly that they understood the content of the waiver.

The first hypothesis was partially supported. Specifically, students in higher grades tended to outperform students in lower grades in their overall recall of information in the waiver forms and their ability to recall the five main rights. This trend is consistent with previous findings that age is a predictor of Miranda comprehension in juveniles (Goldstein et al., 2003; McLachlan et al., 2011). Although we did not directly measure the intellectual ability of students, we suspect that this trend is due to cognitive differences (e.g., working memory and attention) between younger and older students (Luna, Garver, Urban, Lazar, & Sweeney, 2004; Yurgelun-Todd, 2007). On the basis of the research by Goldstein et al. and McLachlan et al., we anticipate that the use of more direct tests of cognitive capacities would help isolate the factors that impact comprehension of Canadian youth waiver forms.

We found limited support for the prediction that comprehension would increase with decreasing waiver form complexity. The small impact of caution complexity may be due to a lack of construct validity whereby the measures we used did not provide an accurate categorization into low and high complexity forms (see Charrow & Charrow, 1979, for discussion of problems with complexity measures such as FK scores). Alternatively, it may be the case that the ‘low complexity’ form was still beyond the comprehension threshold of the youths. Despite being the simplest waiver form in use in Canada, the RCMP-Charlottetown form contained complex sections (e.g., large number of words). Practically, these findings suggest that even the simplest waiver forms in use are not likely to be comprehended fully and that the requirement from case law that legal rights be provided in an instructive and clear manner is likely not being met (R v. Bartle, 1994).

The third hypothesis—that average comprehension levels will be low—was supported. Perhaps the most marked and disconcerting example of lack of comprehension was the misconceptions revealed in the answers to the multiple-choice questions. For instance, nearly half of the youths believed that they had to answer all questions asked by the police—as opposed to having to answer only the questions that they wanted to answer. At this juncture, more research is required to determine whether the poor performance was due primarily to the complexity of the information, the cognitive capacities of the youths, or even the way the waiver forms were delivered (e.g., multitasking and clarity of speech). More insights into whether the waiver forms are contributing to these misconceptions about legal rights or simply failing to correct existing ones are also required.

Most of our participants did not understand their rights fully and therefore would not be protected properly and would be unable to provide a valid waiver of their rights (R v. L.T.H., 2008). This finding held true even for those who reported hearing a waiver form previously, suggesting that prior exposure does not lead to increased comprehension (see Fenner et al., 2002, for similar results with an adult caution). Despite the stark deficits in comprehension, however, youths reported almost uniformly that they understood the information in the waiver forms—which is consistent with the findings from Eastwood et al. (2012) and research using adult participants (Eastwood & Snook, 2010; Fenner et al., 2002). Although there was a positive correlation between reported comprehension and two of the dependent variables, suggesting a certain level of insight into their comprehension, the effect was small, and claimed comprehension was still well below actual comprehension. It is unknown whether this discrepancy is due to a form of acquiescence or a false confidence in their level of understanding. Regardless of the reason, these findings suggest that the common practice of simply asking a youth ‘do you understand’ after each section of the waiver form is an ineffective way to gauge true comprehension levels.

There are at least three aspects of the current study that may affect its generalizability. First, the conditions in which the youths were tested were not the same conditions as it would be for youths facing a police interrogation. Second, a non-offender population of high school students was used to test comprehension. However, research using more ecologically valid designs with adults suggests that recall of legal rights would be lower than that observed in tightly controlled laboratory settings (Rogers, Gillard, Wooley, & Fiduccia, 2011, also see Gudjonsson, Rutter, & Clare, 1995), and research on the cognitive capacities on delinquent youths suggests that they are at an even greater risk of not recalling their rights compared with non-offending youths (Owen-Kostelnik et al., 2006). Given these findings, it is likely that comprehension levels in real-world interrogations are even lower than what was found in the current study. Third, the use of a writing task to measure comprehension may have been biased in favor of the higher grades, as their writing skills may have been more advanced (Troia, Harbaugh, Shankland, Wolbers, & Lawrence, 2013). Future research may want to consider the use of oral recall to address this issue.

Consistent with previous research in the USA and the UK, youths in Canada struggle to comprehend their legal rights as delivered through documents constructed by police organizations. When commenting upon juvenile Miranda warnings, Rogers (2008) stated that such warnings are the result of a ‘well-intentioned but misguided effort to produce better understanding’ (p. 779). We echo that statement with regard to Canadian youth waiver forms. A more comprehensible means for delivering rights to youths (guided by developmental science research) appears to be needed. In addition, police organizations and policymakers may wish to explore the mandatory presence of an appropriate adult or lawyer whenever a youth is interviewed (see Medford, Gudjonsson, & Pearse, 2003, for an assessment of one example of this type of approach in the UK). Until such a time, police interviewers are urged to take additional steps to verify and ensure comprehension of legal rights when interacting with young detainees (e.g., get them to repeat the rights back in their own words) rather than merely reciting the words contained in a youth waiver form. In sum, our findings suggest that youth waiver forms need reforming in order to perform their designed function of affording enhanced protections of interrogation rights.
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REFERENCES


