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AUTHOR Fox, Barry
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ABSTRACT

Differences between reporting and classificatory functions in writing were examined in the responses of grade 10 and grade 12 students: 60 who were successful English students, and 60 on the borderline of passing in each of the grades. The reporting tasks required students to write compositions describing their first day in a high school or some similar event and to report on the most interesting television show they had recently watched. The classificatory tasks required students to write compositions on the problems of old age and of crime. Thus 480 compositions were analyzed in terms of five cognitive and four stylistic linguistic features. The analyses found that, as compared with reporting, the classificatory writing called for more abstraction, more tentativeness, more clauses of condition and concession, and greater syntactical complexity. Classificatory writing discouraged students from prefacing, interrupting, and adding loosely to their core statements since it called for less free modification before the subject or between the subject and main verb, and for less modification set off by points after the main verb. In addition, there seemed to be a correlation (not investigated statistically) between the uses of the features characteristic of older and superior students and writing used to develop thoughts rather than merely to state opinions. (HOD)

COGNITIVE AND STYLISTIC FEATURES OF REPORTING AND CLASSIFICATORY WRITING BY SENIOR HIGH SCHOOL STUDENTS

Barry Fox
2497 Phillip Street
Halifax, Nova Scotia
Canada B3L 3H1
(902)-455-9155

Head, English Department
Queen Elizabeth High School
Halifax, Nova Scotia

Research into writing in school is important because writing is a means by which knowledge (existing in the head) is formulated from information (existing in the world outside) (Bullock, 1975), and because students do a lot of writing of different kinds in school (Burgess et. al., 1973).

Language, says Bullock, is the normal means by which we formulate knowledge in school. The mode of formulation may be inner monologue, speech, or writing, each of which has different characteristics enabling language users to deal differently with their emerging thoughts. The modes to which teachers are most exposed are speech and writing, and both areas are coming under increased scrutiny, especially as a result of the Language for Learning movement.

Through speech we may fix our thoughts temporarily, modifying what we think in the process of uttering them. Writing does not encourage the easy spontaneity of speech. Its special advantage is that it is permanent. From the point of view of communication, this enables us to convey our thoughts over time and large distances. But far more important from the point of view of personal development, we can examine closely what we are writing, coming to modify the formulation of our thoughts more carefully.

Writing takes up a considerable amount of time in most subjects in school. Yet the special benefits of personal growth which writing may offer to students often seem to be lost in the obsession with executing the politenesses of standard spelling and punctuation. And until recently, even in English class, the most frequently used categories of writing were exposition, persuasion, description, and narration, categories based on an eighteenth-century scheme of rhetoric (Britton et. al., 1975); that is, on language considered as a means of communicating with others.

James Britton devised a taxonomy of language functions which considers both the effect on readers (Does the writing inform? persuade? Is it used to create a verbal artifact?) and the psychological involvement of the writer in fulfilling the demands of the functions. (Is it directed at the self? Is the writer a spectator or participant?)

He presents the functions as being on a continuum moving, in one direction, away from the expressive function at the centre, where language is directed at the self, through various sub-functions, towards more public and less personal writing. In this direction, the writer becomes more concerned with the problems of selection and organizing; rules of use become more demanding; personal idiocyncracies are submerged. The reporting function, for instance, requires less organization than the classificatory, though the general function of both is to inform.

Britton devised his continuum to map the uses of writing in different school subjects and at different grade levels. It may be seen as typical of language research from the United Kingdom, first in that it is concerned with psychological involvement rather than with rhetorical effect, and second in that it is not particularly concerned with statistically supported observations (see also, Wilkinson et. al., 1979).

Other researchers have devised other ways of recording language development. One of these taken, in Britain at least, as typical of North America, involves counting the minutiae (structures, words) of utterances. Hunt (1965) and Loban (1976) used this method to assess the development of children on apparently arbitrarily selected aggregations of compositions, while Crowhurst, (1980) used it in the form of counting the average number of words per T-unit to contrast the characteristics of traditional modes of discourse, argumentation and narration.

PURPOSE OF THE STUDY

Britton, thus, makes a number of general, a priori, observations but does not identify verbal characteristics by which to justify them. Hunt, Loban, and Crowhurst, however, identify potentially important verbal characteristics but do not apply them to larger schemes of linguistic functions. The study described here, then, attempted to combine both methods of investigation to see if the differences between writing functions could be statistically supported. With such information it might then be easier to follow Bullock (1975: 164)'s direction for teachers to provide language tasks which make demands on their students, since we might have a firmer idea of the sorts of demands the functions make.

(It should be stated that as Britton [Britton, 1979] pointed out to Williams [1977], his theory is not susceptible of statistical repudiation, so any statistically supported characteristics described in this study are not logically entailed by his a priori assertions. That having been said, he nevertheless did express interest in the clusters of features which would characterize different kinds of writing [Britton, 1975: 200].)

The investigation took two of the sub-functions -- the reporting and classificatory functions -- described by Britton and by Martin et. al. (1976) and considered them in terms of five cognitive and four stylistic linguistic features.

In order to discover the range of responses within a senior high school, responses of four groups of students were assessed. Grade 10, Grade 12, successful English students and students on the borderline of passing in each of the grades. The audience was teacher (general) (Britton, 1975: 118-130).

The question asked was, What are the cognitive and stylistic characteristics of writing produced in response to classificatory and reporting tasks by superior and inferior English students in Grade 10 and Grade 12 for a similar audience.

VARIABLES

Report writing is writing whose dominant function is to state what happened on particular occasions or to deal with particular events or situations. Classificatory writing is writing whose dominant function is to state what generally happens (Britton, et. al. 1975: 157).

Cognitive features were (1) syntactical, (2) lexical and (3) those concerning flexibility. Stylistic features were words and phrases identified by certain positions in the sentence.

Syntactical features were (1) T-unit length, that is, the "independent clause plus all constituent constructions," indicating syntactical complexity (described by Mellon, 1969: 43), (2) adjectival clauses, and (3) adverbial clauses of condition and concession. The lexical feature was the abstract noun, combining the categories of "abstract noun" and "higher general noun" described in Peel, (1975 and 1976). For instance, as they are used in the following paradigm of increasing generalization, "Fido-dog-quadruped-animal," the final two items count as abstract. The markers of cognitive flexibility or tentativeness were used by Michell (1978) and listed in Turner and Pickvance, 1972: 97 and 99, and included words and phrases such as "possible," "could be," "may have." There were, thus, five cognitive features.

Stylistic features were words and phrases in free modification (described in Christensen, 1968: 567-577); that is, words or phrases set off from the main core of the T-unit by junctures or punctuation. Two positions of free modification were counted, (1) "early modification," occurring at the beginning of the T-unit or between the subject and the main verb, and (2) "end modification," occurring at the end of the T-unit. For each of these two positions, (1) the number of times free modification was used was counted, and called "groups" in subsequent discussions, and (2) the number of words was counted. There were thus four stylistic features.

In the following extract early modification is indicated by "_____" while end modification is indicated by "_____."

> Many younger people, especially teenagers and 20's are afraid of old age. Many old people are ignored, with much unhappiness being caused. Although special ramps are placed in public places, there are other difficulties that arise.

Thus there are two groups and 12 words in early modification and one group and five words in end modification.

Most of the features had been used by other researchers (Hunt, 1965; Loban 1976; Cooper and Odell, n.d.; Michell, 1978) usually to describe student development or to distinguish superior achievers from inferior achievers. Counting the number of times free modification occurred was this investigator's innovation.

T-unit length, taken as a marker of syntactical complexity, has, rightly, come in for a great deal of criticism (for instance, Rosen, 1969; Crystal, 1976; Wilkinson et al, 1979). Nevertheless, it has been used to establish a

pattern in the development of children's writing (for instance, Hunt, 1965 and Loban, 1976), and to distinguish different types of writing (Crowhurst, 1980). As a gross indicator, used for research purposes, it appears to be useful.

It may seem that the narration and argumentation of Crowhurst's investigation are similar to the reporting and classificatory writing of this. On Britton's theory, however, they are not even on the same branch of the continuum which he describes. Narrative is on the poetic side and argumentation, while being on the transactional side, is on the conative rather than informative branch. Reporting and classificatory writing are both on the transactional informative branch.

Hunt (1965) and Loban (1976) both show the use of adjectival clauses to be a good indicator of older students, though both ignore the effect of function. They also show no increase in the use of adverbial clauses, though Loban does suggest that the writing topic affects the incidence of this type of clause. Mellon (1969) speaks of the use of "logical conjunctions" in which he includes those introducing clauses of concession and condition, and shows no significant difference between pre and post grade 7 writers. In alluding to this categorization, however, he does allude to an important aspect of development, the willingness to make logical connexions.

Acknowledging that the use of abstract terms may easily be misused, Peel (1975) observes, "the abstract term is a powerful symbol enabling the thinker to systematize knowledge in a precise way and to express hypotheses succinctly." It seems useful, thus, to see the patterns in which students use these symbols.

Of the five cognitive features, that of tentativeness in writing is the one least investigated. It is worth investigating, however, since, as Barnes (1976) points out, it is a useful habit of mind for developing thinking.

Unfortunately, the concentration in schools on final draft writing seems not to encourage it. Britton (1975) sees speculation as very important in the growth of independent thinking, but sees children being trained to write like textbooks. Now, while tentativeness and speculation as Britton describes it, are not synonymous, since the former may not deal with the exploration of generalisations, it is reasonable to see tentative utterances as forerunners of speculative writing.

The four "stylistic features" are features of the arrangement of the sentence and the only ones in this investigation to be identified by their place in the sentence. What they have in common is that they are loosely connected with the central core of the sentence. Calling them "stylistic" features is not to deny the cognitive activity involved in their use.

Christensen (1968) identified free modification rather than the long T-unit as an indication of good writing. His observations were based largely on the writing of contemporary essayists. In O'Hare (1973) these views are criticized but by reference, on the whole, to the writing of novelists -- although the difference in writing function is not acknowledged. Statistical support for descriptions of the use of free modification by distinct groups of children and in different functions seems to be called for.

DESIGN AND PROCEDURES

30 students with an average of 80% in English in each of Grade 10 and Grade 12, and 30 students with borderline-pass marks in Grade 10 and Grade 12 wrote, under similar conditions for the period of a month, tasks expected to produce first draft reporting and classificatory writing.

The reporting tasks required students to write compositions (1) describing their first day in a high school, or some similar event, and (2) reporting on the most interesting television show they had recently watched. The classificatory tasks required students to write compositions on (1) the problems of old age and (2) crime. There were thus 480 compositions.

O'Hare (1973) indicates that a 400 word sample provides a reliable indication of a student's average T-unit length. Writing samples were acquired by counting, for each function and each student, as much of Composition 1 plus Composition 2 as was needed to supply 400 words. Then, to prevent violence being done to meaning, the end of the T-unit in which the 400th word occurred was marked. The features studied in this investigation occurring before that mark were counted. In general, thus, this meant that the investigation assessed a little over 400 words in each function by each student.

The investigator counted the number of dependent variables in each function. 5 per cent of the compositions were rated independently by an experienced English teacher. Using the Arrington Formula (Feifel and Lorge, 1950), interrater reliability ranged between .89 and .97.

The data were subjected to a 2 (writing function) by 2 (grade level) by 2 (achievement level) factorial analysis of variance for each dependent variable. Results were considered significant at the .05 level.

One of the weaknesses of statistical analysis is that the more we insist on internal validity the less external validity the results are likely to have (Guba, 1981). While the statistically-based generalizations, since they follow logically tight analytical rules, are statistically valid within prestated acceptable limits, they say nothing about any individual piece of writing.

Consequently, to give some indication of the relevance of the collected data to individual pieces of writing, the investigation informally examined typical and atypical uses of the features by students in the different functions. It then used the nine features and the statistical data associated with them as a grid through which to examine closely compositons by six students.

Limitations

The main limitation of this investigation is that inherent in all ex post facto research, that of lacking control of the independent variables so as to make improper any implications of causality. It is possible, thus, that the causes of the significant differences may not have been related to the characteristics of the two functions described by Britton.

Another important limitation is that the dependent variables may not be valid indicators of the psychological activities they are claimed to represent, a limitation of all investigations which rely on inferences based on examining surface structures. Further, although the use of a feature indicates that the user can use that feature, not using that feature cannot indicate the writer's inability to use that feature.

RESULTS AND INTERPRETATION

The constraints of space prevent a detailed presentation of the data and statistical analysis. The table below, however, summarizes those sources of variation for which there were significant differences, and following this the results are summarized verbally. The verbal summary and discussion are based on the (considerable) assumption that the observations can be generalized beyond the particular conditions of the investigation.

A Check-list of Significant Differences ($p. < .05$) for the Anova of Three Independent Variables and Nine Dependent Variables

	Function	Achievement	Grade	Achievement/ Function Interaction	Grade/ Function Interaction	Achievement/ Grade Interaction
T-unit	.001	.002	N.S.	N.S.	N.S.	N.S.
Adjectival	N.S.	.035	.007	N.S.	N.S.	N.S.
Adverbial	.001	N.S.	N.S.	N.S.	N.S.	N.S.
Tentativeness	.001	N.S.	.006	N.S.	.009	N.S.
Abstract Nns	.001	.001	.001	.001	.001	N.S.
Early Words	N.S.	.006	N.S.	N.S.	N.S.	N.S.
Early Groups	.001	.002	N.S.	N.S.	N.S.	N.S.
End Words	.028	.001	.001	N.S.	N.S.	N.S.
End Groups	.001	.001	.001	N.S.	N.S.	.029

At the most general level, this study indicates that two types of language investigation, the a priori assertive and the statistical assessment of minutiae, may usefully illuminate each other, even though the former may not entail the latter logically. It indicates this through the clear differences between writing in the two functions. Report and classificatory writing (using the term of Martin et al, 1977), which Britton (1975) distinguished on psychological grounds were distinguished here by their cognitive and stylistic correlates represented by seven linguistic features. Only two of the features, thus, showed no significant difference between functions.

Britton's descriptions may be seen to explain these results. Those for nouns indicate that the classificatory function was less concerned with the world of concrete particulars and individual events than the reporting function was, for it was in the former that all writers in general and superior and grade 12 students in particular (indicated by the significant interactions) used more abstract nouns. And not being bound by the demands of the particular, the classificatory function encouraged more tentativeness, with grade 12 students responding to this demand more successfully than grade 10 students responded. The constraint for organization and the need to be relatively impersonal in the classificatory function may account, too, for the fact that there were more clauses of condition and concession (expressing organized and impersonal logical relations) in that function than in reporting. (Adjectival clauses, on the other hand, did not show significant differences, though informal observations suggested that restrictive adjectival clauses, organizational aspects of a textual, elaborated code, were characteristic of the classificatory function.)

Stylistically, the special cognitive demand which the classificatory function made on students, that of using experience organized by language rather

than by events in the real world, seems to have had its effect. It called for fewer words and groups of words in end modification than the report function called for, and for a similar number of words but fewer (thus longer) groups in early modification. Compared with the reporting function, thus, the classificatory function may be seen as discouraging high school students from prefacing, interrupting, or adding loosely to their core statements. It seems that its demands called for a more closely knit and straightforward structure than the reporting function called for. When, however, students did make prefaces or interruptions in that function, the prefaces or interruptions were longer -- but whether from a need for greater cognitive content or simply greater sonority, or both, is not clear.

In a function where the world was organized by language, where certain logical relationships were important and asides, intrusions, and additive statements were discouraged, where subject matter was dealt with at a more abstract level and where possibilities were explored, a further correlate was the longer T-unit or greater syntactical complexity.

Two of these results deserve special comment. They concern abstract nouns and markers of tentativeness. On average grade 10 students used five times more abstract nouns in the classificatory function than in the reporting function, using 8 more nouns (10.28 as opposed to 2.17). Grade 12 students used nearly six times more abstract nouns in the classificatory function, using 16 more nouns, on average (20.17 as opposed to 3.60). This interaction might be expected on Piaget's theory, as students in high school became steadily more comfortable in the formal operational mode of thinking. The results also support suggestions that writing encourages abstractness in that Corson (1982) shows 15 year-olds increasing the use of abstract nouns between tasks similar to those of this investigation, but tasks performed orally, by only two times.

The results for tentativeness may be misleading. Although there were significant differences in the use of the markers, students used them sparingly. It was not until Grade 12, in the classificatory function, that the mean number of markers rose to one per 400 words. Also of interest is the fact that there was a greater difference between the functions for grade 12 students over grade 10 students, but superior and inferior achievers reacted similarly. The ability to be tentative appears to be a function of temporal maturity.

Britton suggested that the small amount of speculative writing in his sample resulted from the pressures of children working for external examinations. Since the students in the investigation under discussion took no external examinations, it seems that the pressures not to be tentative came from the teachers.

In the 240 sets of compositions, typically, the writing of superior achievers was significantly different from that of inferior achievers in its use of greater syntactical complexity, and more adjectival clauses, and the higher level of abstraction at which it dealt with experience. Stylistically, it used more of all four categories of free modification. Only for tentativeness and the adverbial clauses were there no significant differences.

These results continue clouding the water regarding T-unit length and writing quality (see Crowhurst 1980), and fail to support Loban (1976)'s observation that superior achievers show more tentativeness. Loban also observed that, orally, superior achievers used more clauses of condition and concession. In this study, such students did not transfer this tendency to their writing. Christensen's observation that free modification was a characteristic of superior writing was supported in that superior achievers in this study used more of each category of free modification than inferior achievers used.

Based on the same compositions, the writing of grade 12 students differed from that of grade 10's, typically, in that it used significantly more adjectival clauses, more markers of tentativeness, and dealt with experience at a higher level of abstraction. There were no significant differences for syntactical complexity or the adverbial clauses. Although there was no difference in either category of early modification, it used more of both categories of end modification. There was, too, an achievement/grade interaction for groups of words in end modification by which the difference between the number of groups used by superior and inferior achievers was significantly less in grade 12 than in grade 10. This was striking: for all other variables the difference between achievement levels was similar for grade 10 and grade 12, or was higher in grade 12. It is tempting to see this as an indication that schooling is having a positive effect in only one area, that of end modification, though of course the students in grade 12 were not those in grade 10 but two years older.

The general increase over time in T-unit length reported by many researchers is not supported by this study. The observations of Hunt and Loban that a greater number of adjectival clauses is a characteristic of older students is supported, however, as are the observations of Hunt, Mellon and Loban that the use of adverbial or logical clauses does not appreciably increase with time.

The Informal Study

Nothing that informal observations suggest can in any way affect the validity of these statistical results. Informal investigation did, however, complement the statistical results, making observations undetected by statis-

tical analysis about the uses of features and the writing of individual students. For instance, it indicated the variety of effects created by T-units longer or shorter than the norm; that adjectival clauses seemed to have two characteristic uses; that the markers of tentativeness, here, did not exhaust how students indicated their tentativeness, and that the use some students made of the markers showed they were dithering rather than being flexible; that even if all other features suggested that an iconoclastic student was trying to ape the writing of inferior achievers, the number of abstract nouns indicated the writer's true ability; that a subnormal feature profile may sometimes be a paradigm of dulness and sometimes of considerable warmth of life. Regarding style, it became clear that very many casual, as well as formal, phrases were used in free modification; that free modification could result from non-standard word order, or from affectation, as well as from more serious purposes. And that some of the so-called sentence fragments of poor achievers decried by teachers, when punctuated in the standard way, became end modification, a characteristic of the writing of superior achievers. It was clear, thus, that the range of uses of many of the features needs to be investigated further.

Using the features as a grid and comparing the feature profiles for each student with the norms provided an interesting perspective to view the writing. And though the following descriptions, which show the grid being loosely applied, may seem to take up a disproportionate part of this paper, it is appropriate that in a discussion of student writing, samples of two of the subjects be examined.

Georg was a superior achiever in grade 12 and Tommy was an inferior achiever in grade 10. Below, are given the function profiles for each student along with the function norms for each grade.

A Profile of the Writing of Georg, with Mean Grade 12 Scores per 400 words

	Mean Report	Georg Report	Mean Classif.	Georg Classif.
T-units (Number of)	30.52	30	27.35	25
Adjectival Clauses	4.47	5	4.23	11
Adverbial Clauses	.50	4	1.90	2
Tentativeness	.25	2	1.07	2
Abstract Nouns	3.60	2	20.07	42
Early Words	41.63	31	44.52	73
Early Groups	9.13	5	7.88	16
End Words	24.50	36	21.15	31
End Groups	2.97	4	2.28	3

A Profile of the Writing of Tommy, with Mean Grade 10 Scores per 400 words

	Mean Report	Tommy Report	Mean Classif.	Tommy Classif.
T-units (Number of)	30.63	39	26.67	33
Adjectival Clauses	3.53	2	3.45	2
Adverbial Clauses	.73	0	2.20	3
Tentativeness	.23	0	.48	1
Abstract Nouns	2.17	0	10.28	9
Early Words	39.13	10	39.17	49
Early Groups	8.93	3	7.32	8
End Words	16.95	4	10.18	0
End Groups	2.05	2	1.27	0

Georg's reporting deals with his memories of Poland when he was a boy. He starts by referring to his secrecy in the schoolyard made necessary by his family's religious affiliations. He talks of evening conversations of his parents' friends discussing other friends in labour camps or mental hospitals. When his father became ill, he describes his feelings from seeing his father being taken away, wondering if he was going to a "mental hospital", and believing he would never see him again.

He eschews the stylistics of shock or of rhetoric and appears content merely to get on with the matter in hand.

In parts, reminiscing through writing procedures longer T-units:

> His room was always dark because it had navy blue wall paper and to this room various doctors came to give him needles and transfusions. There was a foreign doctor that came once although now thinking about it he probably didn't because whey would they send him a good foreign doctor?

Here a thought occurs to him as he writes, introduced by "although" which marks both a clause of concession and also a lengthy piece of end modification. It includes, too, a marker of tentativeness. Immediately after, however, he describes the actions of men arriving for his father, and his thoughts:

> I was standing out on the entrance of our apartment house with two of my other friends. I don't remember what we were talking about but a white van with a red cross drove up the street leading to the building from the highway. Two men got out and went into the doorway of our porch. We lived on the second floor, there were nine, and I knew they were going to the second. I remember thinking about a mental hospital.

The T-units here are shorter but there is no sense of deliberate stylistics. He writes as he remembers and the events are too suddenly intrusive to lead to meditation.

Statistically, Georg's reporting style is average for his grade for T-units and adjectival clauses. He uses more adverbial clauses and tentativeness, reflecting his thoughtfulness, but only half the average for abstract nouns. In free modification, he uses fewer words and groups in early positions than the norm, but in end positions he uses more words and groups, suggesting a tendency to trailing extensions to his thinking rather than to modifying it early.

Like the composition on life in Poland, that an old age is far from normal as far as the subject matter is concerned. But again, the individuality is reflected throughout the statistical profile; for instance, here he uses twice the norm for abstract nouns whereas his reporting writing used half the norm.

The composition ignores the list of physical and social problems treated by most other students. It treats, instead, psychological problems and in some depth -- Georg considers the irritation the old must feel at demanding attention and points out the irony that even if he wasn't irritated the very need for attention must remind him of his loneliness. He considers how having aims makes life worth living but when we are aware that death is approaching our earlier aims seem vain:

> With the diminishment of physical ability one becomes more isolated. There is a need to create new goals in order that life be meaningful. Spiritual and intellectual goals may be more difficult to find. Whether they are or not, seeking them requires a change in one's approach to life. Like King Lear's experience, the change may be drastic; one whose magnitude has been matched only by the transition from childhood to adulthood. But in this transition deeper aspects of the human being are involved. This demands a more individual search, one with which most other people cannot help as their experience was different.

This extract conveys well Georg's awareness of the complexity of the subject, which affects the style. He acknowledges that he cannot describe unerringly what will happen and acknowledges other possibilities. Tentatively he observes "goals may be difficult to find" and underlines this with the conditional "whether they are or not" and later, "the change may be drastic". The two long end modifications ("one whose ... adulthood" and "one with which ... experiencewas different") are used not in a flamboyant way, as several superior students used it, but quietly to convey the size of the problem by comparing it with another important change in human development and to show why others cannot help in the search.

In his classificatory writing, Georg uses nearly three times the grade/function norm for adjectival clauses, all appearing close to the beginning of his composition, as they did for a number of superior students. In this opening sentence the different texture they create is apparent.

> A grown up who has found a certain core within himself that enables him to handle various situations alone and who is no longer as cared for or protested may one day come to think that it would have been easier to skip from childhood to senility.

The T-unit is a long one, as a result of the three adjectival clauses. Because of its contrast with the rest of the essay, this sentence seems to mark a warming up before the writer has got into a more extended consideration of the subject. It may be that the writer senses the appropriateness to his subject of long T-units (he uses 2 1/2 units fewer on 1 1/2 words more than the norm) and so uses adjectival clauses as the means of extending them to start with until he has warmed up and can move into the looser style of free modification.

The most striking feature of Tommy's writing is its empty ingenuousness. From reading his compositions I got the impression that Tommy never made any adjustments for audience in any of his verbal interactions at school. An indication of his artlessness may be illustrated by this concluding section of his reporting composition, where, after speaking of his first job in a grocery store, he describes his brother's wedding at which he was an usher:

> When you walk the people in you are supposed to give out hymn books and prayer books well we both were so excited we forgot all about the books so when the minister said the service for today is on page 501 I and his brother almost had a shit no one had any books to go by. Other than that it was excellent we all had blue tucks on and I give them money and I rented the disc jockey for the party $200.00 dollars and we all got drunk

In his composition on old age he spends a considerable amount of space lamenting the abuse he has to face from old people in the grocery store in which he works:

> What I think would be good is if all the young and middle age would treat the old with a little more freedom and I am sure when you and I get old we will all have some problems and give some so all I can say is (hang in there gramps!)

Such unalloyed and unthinking optimism is a delight to read but must be rather trying to a teacher attempting to get Tommy to use writing as a means of exploring or coming to refine his thoughts.

Although for nearly all features Tommy's scores indicate his underdevelopment, as compared with the norm, they do show him acknowledging differences between the functions similar to those acknowledged by all students taken as a whole in the investigation. For the reporting function he used shorter T-units, he was below the norm for modifying nominals with clauses, he used no adverbial clauses of condition or concession, no markers of tentativeness and

no abstract nouns. He used a quarter of the norm for words in early and for words in end modification. His profile for classificatory writing shows similar relations with the grade norms. Only in words in early modification does he have a score on the positive side of the norm, and much of this was in free modification because of Tommy's problem with the word order of standard written English.

In both functions his writing is concrete and anecdotal, as indicated by the absence of abstract nouns in reporting and only half the grade norm in classificatory writing (in contrast with Georg who used half the norm and twice the norm respectively). He does use one "maybe" but it is used to underline how very unlikely it would be for the old to ever act reasonably: "maybe the old would let the young have a little more freedom". His end modification for both functions combined consists of two two-word utterances "real gross" and $200.00 dollars".

The figures indicate that Tommy's writing is on the undeveloped side of the norm in nearly all areas. What it is not below the norm in is outside the realm of measurement, and that is its life, which the figures do not reflect. The liveliness comes not from playing with style, such as deliberately using short T-units or little free modification, but from a limited awareness of or a total disregard for the normal expectations of writing.

The grids, thus, are useful but they may act as sieves if they are not treated very carefully; for instance, Georg's report profile shows him as subnormal in his use of early modification and abstract nouns. To use the grids effectively the meaning of what is written also needs to be considered. And this leads to the single most important observation based on the informal part of this study, and that is, that when meaning was considered along with the profiles an apparent correlation became evident between the uses of most of the linguistic features and a particular attitude to writing. The attitude was

that of students who seemed engaged with their writing -- who recognized that it could be used for more than creating a shopping list of undeveloped statements and could be used rather to formulate their thoughts. The features were those used typically by superior achievers or grade 12 students or both. Greater syntactical complexity, the greater use of free modification, and more adjective clauses seemed, on the whole, for example, to come from students who recognized that writing could be a realizor of experience and was not simply dictation for the right arm.

A dramatic illustration of this attitude to writing is provided by a student calmly describing the situation which led to the break-in in his mother's shop:

> What I saw totally surprised me and I paused for a split second, it was a man wearing a ski mask and a black hat, he also had a cowboy coat and a pair of jeans on. (4 T-units; 37 words)

Suddenly, he is aroused by his emotions and writes a T-unit of 73 words:

> I grabbed a mop which was erected against the counter and was going at him to jab him in the face, stomach or simply crack his head open and beat him senseless which I truly felt like doing and would have great pleasure in doing for there was nothing I could think of which would make me feel happier than seeing that guy in a pool of blood which I could have caused.

Here it seems that the experience was being realized through the writing and suddenly the furnace of the emotion burst into flames, willy-nilly. And in the following delightful piece an immigrant girl living in an apartment building describes the first snow she'd seen

> To me it looked as if we were flying upwards; the snow being objects we passed along the way. That was sheer terror! Never again have I felt so scared. It is hard to explain the fear involved in not understanding what is going on or what one can do about it. (4 T-units; 52 words)

Here, the mean T-unit length is longer than average for her grade and function.

IMPLICATIONS

Implications for teaching based on this study concern three main aspects of writing, (1) its individual features, (2) students' attitudes to it and (3) the differences between the functions.

(1) Superior achievers or older students or both found most of the features more useful than their younger or less successful colleagues found them. Perhaps, then, inferior or younger students should be made more aware of these features, especially since choice is at the heart of language use. For instance, in private discussion, some students indicated that they believed some end modification was "bad English." Choice, for them, presumably was more limited than it was for those with this structure in their active linguistic repertoires. One implication, thus, might be to expose students to such loose structures (but not to use "end modification lengthening exercises" which could well lead students to trying to satisfy teacher rather than to using them to explore and extend experience).

(2) In the area of particular features, too, the use of markers of tentativeness reiterates Britton's observation that students are unwilling to use writing to explore possibilities. The implication, thus, is that students need to be encouraged to change their attitude to writing if it is to be used for more than stating preformed opinions.

Indeed, dealing with attitude seems more likely to improve students' writing than dealing with linguistic features, which inferior achievers can at times use in ways characteristic of high achievers. The informal investigation suggests that for poor writers to metamorphose into good writers, they and their teachers need to understand that involvement of the self is an acceptable use of writing and that communication of facts is not its only use. They

especially need to feel the confidence to guide themselves in their writing, as opposed to being guided in the execution of arcane pieces of putative communication by cramping rules prescribed by those with little personal knowledge of the practice or nature of writing. One very important implication for teaching, thus, is that students must abandon the procrustean attitude to writing which appears to inform much of what they write in school and be helped to see that writing can be used to explore and refine their thoughts and the expression of their feelings.

(3) Hockett (1954/1977) suggests that the availability of certain syntax and lexis makes it easier, at least, to deal with a subject in a particular manner. And it seems reasonable to suppose that using particular linguistic features at one time will make those features more readily available at a later time. This investigation has indicated that there are probably differences in the use of certain linguistic features in different functions. If we wish to encourage facility in the use of both sets of features in appropriate contexts, thus, it seems we must encourage students to write in contexts where both sets are likely to be used.

This observation has implications for the growing movement in schools which holds that we learn to write by writing and that we must encourage more expressive writing, and which has led to the institutionalization of "journals". The data, here, suggest that we learn to write reporting by reporting and classificatory writing by classificatory writing. Expressive writing, thus, though it may affect attitudes to writing and produce the soil out of which transactional language can grow (Rosen, 1969), may more broadly affect transactional writing if teachers give some direction as to what students do when they write expressively. Bullock speaks of the need for planned intervention in the writing of students to help them increase the complexity of their thinking. One form of intervention may be to ensure that in their journal

writing students deal with experience both at the level of particular events and at the level of generalizations. This will provide students with opportunities to use the differing clusters of features by which they increase the complexity of different types of thinking and will also help provide for sturdier growth when they write in both transactional functions.

Regarding implications for research, probably the first requirement is to establish whether the differences between functions described here were the result of the particular assignments or of the functions they were claimed to represent; nevertheless, based on one investigation it becomes clear that any use of normative feature counts must consider (a) the context (in its broadest sense) of the writing and (b) the meaning of what is written.

Other important areas needing investigation also emerge.

(1) Systematic investigation in the use of many of the features seems needed. For instance, what are the characteristic conditions for the use of restrictive and non-restrictive clauses; what are other markers of genuine tentativeness; what types of early modification do students use, and how are they distributed -- the types might include link signals, colloquialisms, one word groups? What are the uses and distribution of colloquial asides in end modification? What is the proportion of end modification which might be called "sentence fragments"?

(2) Broader studies using surface features might include the following: contrasting the writing of students brought up on traditional rules of composition and those who have been encouraged to use its exploratory function. Assessing how close to Bernstein's restricted code is the writing style of inferior achievers. Assessing the difference between a recently researched piece of classificatory writing and one about which the writer was already very

knowledgeable. Assessing the difference between reporting on a topic about which the writer has strong feelings and one about which he or she is neutral.

(3) More general investigations involving inner drives seem important. For instance, what do students think teachers want them to do when they write? What is the limit of acceptability of T-unit length? What types of free modification do students think is appropriate to their writing? How much do rhythm and sonority affect writing style?

SUMMARY

Schools get students to do a lot of writing. Bullock says teachers need to give written work which makes demands on students. But what does school writing require of students which might be important to their development? Do all types of writing make similar demands? Britton says they do, but gives no evidence.

This study describes the demands of two types of writing, the reporting and the classificatory, using nine linguistic features. As compared with reporting, the classificatory writing called for more abstraction, more tentativeness, more clauses of condition and concession, and greater syntactical complexity. It discouraged students from prefacing, interrupting, and adding loosely to their core statements since it called for less free modification before the subject or between the subject and main verb, and for less modification set off by points after the main verb. Interactions showed some recognizable groups of students responding differently from others to the demands for tentativeness and abstraction.

There were differences between ability levels for seven features and between age levels for five features. Generally there seemed to be a correlation between the uses of the features characteristic of older and superior students and writing used to develop thoughts rather than merely to state opinions, but this relationship was not investigated statistically.

There are two main implications for teaching. The demonstrably different characteristics of the two functions suggest that students need opportunities to write in both functions since it seems unlikely that writing in one will affect writing in the other. The characteristics of the writing of superior achievers and older students suggest that students (and teachers) need to abandon the procrustean attitude that writing is for stating preformed opinions and need to see that they can use it to explore and refine their thoughts and the expression of their feelings.

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Further details of this study are available in my "Cognitive and Stylistic Features of Reporting and Classificatory Writing in Grade 10 and Grade 12", a Ph.D. thesis at Dalhousie University, Halifax, Nova Scotia, Canada.