

DOCUMENT RESUME

ED 279 090

EA 019 213

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 TITLE Studies of the Innovation Process in Compulsory School.
 INSTITUTION National Swedish Board of Education, Stockholm.
 PUB DATE Nov 86
 NOTE 15p.
 PUB TYPE Collected Works - Serials (022) -- Reports - Research/Technical (143)
 JOURNAL CIT School Research Newsletter; n8 Nov 1986

EDRS PRICE MF01/PC01 Plus Postage.
 DESCRIPTORS Behavior Standards; Decision Making; Educational Development; *Educational Environment; *Educational Innovation; Elementary Secondary Education; Foreign Countries; Instructional Improvement; Interdisciplinary Approach; Longitudinal Studies; Organizational Climate; Organizational Theories; Research Methodology; Research Projects; *School Organization; School Surveys; Social Behavior; *Social Science Research; Social Theories; *Student Attitudes; Student School Relationship; *Teacher Attitudes; Teacher Student Relationship
 IDENTIFIERS *Sweden

ABSTRACT

This monograph presents an overview of reports from a 4-year intensive research study of internal life among 3 Swedish compulsory schools and includes discussion of a 10-year follow-up study of 12 senior-level compulsory schools. The 4-year project sought to understand innovative processes, but because few innovations were observed, research centered on identification of organizational factors that either support or frustrate development. Information was collected through interviews, informal talks, observations, and questionnaires. The sociopsychological, "multi-method" approach examined change at the schools' local organizational level. Researchers found little development, though numerous changes had been proposed. Investigation shifted to the influence of school norms upon decisionmaking. Project reports make conclusions concerning implementation of improvements. Survival of improvements depends upon effective design of decisionmaking, actor participation, and systematically planned innovations. An ongoing follow-up study of climate in 12 senior-level schools between 1969-79 indicates tentative conclusions, including the observation that teacher-pupil opinions about each other remain unaltered. Differences in attitudes and behaviors between boys and girls have generally persisted, which also has occurred among social classes. Principle findings are provided in two concluding pages of references. (CJH)

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SCHOOL RESEARCH Newsletter

NOVEMBER 1986

FIELD - TOPIC
Innovation research
School spirit
Social psychology in school

1986:8

Concluded project

TITLE OF PROJECT: STUDIES OF THE INNOVATION PROCESS IN COMPULSORY SCHOOL

Intensive studies have been made of the internal life of three schools during four years (1977-1981). A socio-psychological perspective has been employed, putting the local organisation in focus. The aim was to understand the process of innovation in compulsory school but, since few innovations have been observable, the study has above all come to centre round the stabilisation process in school.

The project has also included a ten-year follow-up of the atmosphere at twelve senior-level compulsory schools. This study also reveals wide-ranging stability in school activities and the school climate.

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THE RESEARCH IDEA

The aim of the INOVA project has been to understand the innovation process in compulsory schools. The research idea emerged from an action-related research project focusing on pupils' social development. The results of that project (reported in the NBE R&D report series no. 36) demonstrated the possibility of transforming schools in the direction of the curriculum. At the same time it confirmed observations of the stability of many details about school in which, for many years, the community have been demanding changes. This applied to such details of school life as classroom working methods, teacher-pupil power relations, and the domination of teaching by textbooks.

The INOVA project was planned during the years when the report of the SIA Commission was being turned into a Government Bill. The research idea was simple. We wanted to study the way in which current demands for improvements presented to schools were processed and turned into new routines in ordinary compulsory schools. We planned to study schools for a considerable period, so as to illustrate in very concrete terms the reception given to new developments. The studies were above all to be based on direct observations. These observations were to be supplemented by spontaneous talks and more systematic interviews, and also by questionnaire studies and the collection of documents generated by schools.

THE RESEARCH IDEA IN PRACTICE

We made a close study of the activities of three school management areas over a four-year period (1977-1981). During this time we observed most of what went on in the three areas, but we took special care to be present when there were plans for improving activities, as for example at certain conferences or during in-service training sessions.

Broad-based collection of data

In keeping with our research idea, we have employed a "multi-method approach" in our research work, in the sense that we have collected information about life in the schools investigated by means of interviews, informal talks, direct observations, questionnaires and documentary studies. We recorded our observations and talks in discursive diaries. Data were collected everywhere in school - in classrooms, staff rooms, head teachers' offices, playgrounds etc. We built up our understanding of events with the aid of information from all members of the school community.

Changes demanded

Our study has been organised in such a way as to give us an idea of what school development work can look like in a period when the three schools under observation received many signals from the community telling them that they should revise their internal organisation. Politicians required schools to use a wider variety of working methods, so that more pupils would feel motivated for school work. Schools were to take better care of pupils with learning difficulties. At the same time vociferous debaters demanded that schools should attend to the fundamental transmission of knowledge and skills in a manner more closely resembling the old school grind, the implication being that schools had abandoned such methods. Parental groups, together with pupil organisations, demanded wider scope for asserting their interests.

Local organisational perspective and chronological rhythms

In our research work we chose to observe and analyse schools at local organisational level. Thus we treat the individual school management area as an integral whole, having the school system as its background and incorporating any number of educational and social processes. As observers we concentrated our attention on factors influencing the whole of the local organisation constituted by a school management area, e.g. the school decision-making system, and patterns of communi-

cation in school or co-operation interfaces between different groupings.

In our research work we tried to investigate the chronological rhythms described by the development process. On the strength of our reading and personal experience, we have assumed that the development process in the individual school, where more extensive changes such as a revision of teaching methods are concerned, extends over a period of more than five years.

We have concluded that the school development process involves three distinct phases: preparatory, investigative and implementing. During the preparatory phase the innovation is introduced in school and the first attempts are made to use it. During the investigative phase the innovation is tested by more and more people in school and the members of the school decide whether or not to make it a new routine. If the innovation reaches the implementing phase, it enters the established routines. Instead of seeming new or remarkable, it now becomes one of the many axiomatic features of school. We have also noted that schools can enter what we term a dissemination phase where innovations are concerned. This phase can occur during each of the three phases already mentioned. During this development phase, the school makes sure that the new attitude is disseminated to other schools.

Development process

We have been able to establish that development of a school is a process, not an event. In addition to being extended over a considerable period of time, development also has its ups and downs. Sometimes it comes to a standstill, at other times it gathers speed and rushes onward. Sometimes progress is made which obviously moves things nearer to the objectives, and sometimes the process slithers off in a completely unexpected direction. The flow of events making up a school's development process is not entirely predictable. The chain of events is full of opportunities of choice, and it should be possible to make the choices on a sensible, rational basis. Although most of the people involved in a school's development process try to behave sensibly,

logically and rationally, the school development process does not always follow a logical, rational course. Because schools and school development involve human beings, the development process is also based on involvement and on strong feelings, both negative and positive.

The school development process is not usually linear by nature. It seldom fits in with technological, rational intellectual structures. Because there are so many processes going on simultaneously in a fabric of social interaction, entire "bundles" of change appear at once. These changes are sometimes closely interlinked and further the course of development. Sometimes they counteract each other and the development process comes to a standstill or is obstructed. At the same time as some changes can produce a complex chain of events in school, the school community also includes people with conflicting interests. Their efforts to gain a hearing for their interests, and the conflicts, periods of silence and compromises which can follow such attempts, all leave their mark on the development process.

Few innovations in sight

In our study of the internal life of the three schools, we found for the most part that there was very little development during the four years. We found no trace of the many changes and improvements which had been demanded in schools, such as giving the pupils more say in the planning of teaching during working unit conferences, making more use of investigative working methods and organising teachers into working teams. In some cases we found that, during the observation period, changes were made in the direction desired by the community. During the latter part of our observation period, schools got down to constructing local working plans, and there was one school where junior level teachers began using the LTG method of reading instruction.

One or two teachers in the schools investigated have set about improving their own working methods. We found that at least one teacher in five was engaged in some form of individual experimentation. This is often of a limited nature, e.g. improvements in the use of teaching materials or experimentation with alternative types of test.

Flashes in the pan

During the years we spent at the schools, we occasionally saw individual teachers trying to disseminate their ideas for improvement to other members of the school community. We also saw head teachers trying to bring about new routines and working methods. Sometimes the changes were concerned with conference and decision-making routines, sometimes they were aimed at introducing more pupil-active working methods. These attempts at change, however, were flashes in the pan. Ideas have been put forward and left at that. People in school have not felt obliged to act on the idea, and it has petered out. The examples we have seen of individual teachers applying progressive pedagogics have proceeded without much insight from their colleagues. The teachers concerned have worked in silence together with their pupils. This has been rather heavy going, because the working method has forced the pupils to work outside their ordinary routines, which of course has given rise to complications.

In one of our research reports we compared the innovative activities we had observed at schools to a saucepan of fairly thick oatmeal porridge coming to the boil. Before our eyes, the thick, smooth porridge has gradually boiled down a little and, in the middle of the viscous mass, a crater has sometimes developed in which the porridge has been lifted up for a moment and heat has risen from below, leaving a momentary hole, after which the porridge immediately reverts to its grey viscosity, smoothing out every sign of eruption.

Stabilisation instead of innovation

Because so few innovations penetrated the schools during the four years we were studying them, we came to devote more research effort to understanding the stabilisation process than to understanding the innovation process in schools. Thus we tried to identify the factors in the local organisation respectively supporting and frustrating the development process. Above all, we used a socio-psychological conceptual apparatus in our descriptions and analyses of the events we were able to observe.

This led us to analyse the local norms of schools, those governing what people ought and ought not to do in the course of their work. We were able to observe how these norms restricted the scope for people in school trying to initiate improvements, especially those implying a change in the work of teaching. We have described how, among adults in school, there are group pressures exerted against those who deviate from conventional teaching patterns. It has also become clear how sensitive adults in schools have been about preserving the pre-existing power relations between their own group and the pupils. In our study we have shown how the stability of working patterns is rooted in the "organisational naivité" of the staff. In this descriptive term we have tried to capture our observations that adults quite seldom have the same views, for example, concerning the decision-making process or concerning the norms and rules applying to agreements between adults at school.

Optimistic conclusions

In addition to various historical retrospects of the pace of change in schools during this century, the research reports from the project also include discussions of the conclusions to be drawn concerning ways of bringing about active improvements to schools in the direction proposed by the relevant curricula. Here again, the perspective is confined to measures within the local organisation. In order for improvements to survive in the school management area, it seems that the systems of responsibility and decision-making, which are closely interconnected, must be designed so as to ensure that decisions are put into effect and that the people directly affected by them are able to play an extensive part in the making of them.

The school management area also needs to build up a more distinct system of scrutiny and assessment. Above all, recurrent scrutiny and assessment are needed of the work inputs of adults. In order for this sub-system within the local organisation to be viable, social distances between members of the school must be kept short and they must be capable of living with a healthy lack of respect. In order for the scrutiny and assessment of work to function properly, for example,

pupils must not be afraid to show teachers their reactions to the teaching received. The internal system of rewards within the school management area needs to be adjusted so as to put a positive value on risk-taking, ingenuity and inventive attitudes.

To prevent efforts at improvement from becoming isolated, passing phenomena, schools need to work as systematically on their own innovative activity as they are now doing with their teaching. It is particularly important for improvement plans to cover a relatively long period, with intervals of between three and five years being the normal practice, not an exception. It is also important for schools to find one or more officers who have the courage to endorse school objectives completely and, through their practical behaviour, personify those objectives in school. Thus it seems particularly appropriate for head teachers to discharge this function.

TEN YEARS' SCHOOL DEVELOPMENT IN TWELVE SCHOOLS

In the course of this project we have also carried out a follow-up study of the atmosphere in twelve senior-level compulsory schools. This too involves viewing school activities in a local organisational perspective. A questionnaire survey has been conducted, emanating from a notional model of the results and determinants of the school culture. Grade 8 pupils and their teachers answered about 70 questions. These questions were circulated in the spring of 1969 and again in the spring of 1979. Altogether about 1,500 pupils and over 200 teachers took part in the study. Analysis of the study has yet to be completed, but interim reports have shown that a great deal of the school atmosphere has remained unaltered during the ten years in question.

Teacher-pupil relations constant

Above all, one finds that teacher-pupil relations remain unaltered, in the sense that many pupils, for example, believe their views and opinions to be further removed from the teachers' than is really the case. Pupils' and teachers' opinions as to commonly occurring teaching patterns also remain unaltered over the years. The influence exerted

by pupils on their everyday life in school remains placid after the ten years that have passed.

Differences apparent

Some observed changes have been reported which prove to apply to a distinct majority of the twelve schools. One finds, for example, that more pupils show great tolerances towards an age-mate with a physical disability but at the same time that more pupils have become less tolerant of pupils with slight mental deviations. More pupils in 1979 than in 1969 displayed an independence in situations less related to schools. In powerfully school-related situations, a less independent, more teacher-dependent attitude persists among 15-year-olds. One finds that pupils in 1979 were devoting less working time to homework than in 1969 and that teachers at most of the twelve schools were spending less time on work apart from their teaching duties.

In certain respects the analyses of the ten-year study indicate persistent variations in school climate. Comparing the attitudes and habits of boys and girls, one finds that differences between the sexes have persisted far more than they have diminished. Analyses of the attitudes and behavioural modes of social classes show that these differences persist or, to some extent, increase, but that some equalisation appears to occur where girls are concerned. There are a few respects in which class differences diminish; for example, there is a convergence of classes with regard to the sense of common identity and helpfulness among young persons.

The analysis of the ten-year study continues and new reports are planned. Some reports have still to be prepared on the study of four years' developments in the three school management districts, but the main findings are described in the books and reports listed on the following pages.

REFERENCES

- Ekholm, M.: Studier av innovationsprocessen. Bakgrund och överväganden. Forskningsplan. Inova-projektet. Department of Education, Linköping University. 1978.
(Studies of the innovation process. Background and deliberations. Research plan.)
(In Swedish)
- Ekholm, M., Sandström, B., Svanberg, G. and Tjellander, B.: Skolan - funderingar och värderingar. Inova-projektet. Department of Education, Linköping University. 1978.
(Schools - questions and assessments.)
(In Swedish)
- Ekholm, M. Jämställdhet? I Skolan? Published in Att undervisa. 6, 1980.
(Equal opportunities? In school?)
(In Swedish)
- Sandström, B. Lärarnas syn på skolan. Resultat av en intervjustudie. Inova-projektet. Department of Education, Linköping University. 1982.
(Schools as teachers see them. The results of an interview study.)
(In Swedish)
- Sandström, B. Elevernas syn på sin skolan. Resultat av en elevenkät. Inova-projektet. Department of Education, Linköping University. 1982.
(Schools as pupils see them. Results of a pupil questionnaire.)
(In Swedish)
- Tjellander, B. Stämningsbilder. Inova-projektet, Department of Education, Linköping University. 1982.
(Moods in focus.)
(In Swedish)
- Tjellander, B. Undervisningen. Inova-projektet, Department of Education, Linköping University. 1982.
(Teaching.)
(In Swedish)
- Tjellander, B. Förändringar. Inova-projektet, Department of Education, Linköping University. 1982.
(Changes.)
(In Swedish)
- Tjellander, B. Forskningsmetod inom Inova-projektet. Inova-projektet, Department of Education, Linköping University. 1982.
(Research method in the INOVA project.)
(In Swedish)

- Ekholm, M. Hjelpsomhet og toleranse - noen utviklingstendenser. Published in Tilskuer eller deltaker. (Ness, T., et al. Tiden Norsk Forlag. Oslo 1982.) (Helpfulness and tolerance - some development tendencies.) (In Norwegian)
- Ekholm, M., Sandström, B., Svanberg, G. and Tjellander, B.: Studies of the process of innovation in the comprehensive school. International school improvement project, OECD-CERI, London. 1983.
- Ekholm, M. Demokratins baskunskaper - några utvecklingsdrag. Published in Forskning om utbildning. 1, 1983. (Basics of democracy - some aspects of development.) (In Swedish)
- Svanberg, G. Iakttagelser om förändring i ett grundskoleområde. Inova-projektet, Department of Education, Linköping University. 1983. (Observations concerning change in a school management district.) (In Swedish)
- Ekholm, M. Improvement or not - That is the question. Published in Alternative perspectives on school improvement. (Hopkins, D. and Wideen, M.) The Falmer Press. London. 1984
- Ekholm, M. Readiness to Help Others and Tolerance: Attitude Development During the School Years and a Ten-Year Comparison. Published in Scandinavian Journal of Educational Research 28, 1984.
- Tjellander B., Beslutsfattande. Working Report 4, Department of Education and Psychology, Linköping University. 1984. (Decision-making.) (In Swedish)
- Sandström, B. and Ekholm, M.: Stabilitet och förändring i skolan. NBE, Educational Research R&D Report 50, Liber, Stockholm. 1984. (Stability and change in school.) (In Swedish)
- Olsson, K. Ungdomars värderingsmönster. En tioårsjämförelse och en socialgruppsanalys. Department of Education and Psychology, Linköping University. 1985. (Young persons' value patterns. A ten-year comparison and a social class analysis.) (In Swedish)
- Ekholm, M. Study days in Sweden. Remarks about their efficiency and a study of institutionalisation. Published in Lasting school improvement: the process of institutionalization. (Miles, M.B., Ekholm, M. and Vandenberg, R.) ACCO, Leuven. 1986.
- Tjellander, B. Durkheim, working patterns and social control in a Swedish comprehensive school. NFPF Conference in Jyväskylä. 1986.

Sandström, B. and Ekholm, M. Innovationer i grundskolan - metoder och
resultbilder. Rapport 98, Department of Education and Psychology,
Linköping University. 1986.
(Innovations in compulsory school - methods and pictures of
results.)
(In Swedish)

Sandström, B. Studies of the process of innovation in the comprehensive
school. Reprot no. 1986:01. Department of Education and Educa-
tional Research. Göteborg University. 1986.

SCHOOL RESEARCH NEWSLETTER

School Research Newsletter contains reviews of current and terminated research within the field of education.

School Research Newsletter is published and distributed in an edition of 450 issues ten times per year. The Newsletter is obtained free of charge.

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