



Departemen Pendidikan dan Kebudayaan

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DOKUMENTASI  
PUSBANG KURRAN

# Case Study Research Field Work Report

By

Prof. Nana Syaodih  
January 1999

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# **CURRICULUM CAPACITY PROJECT (CCP)**

**Pusat Kurikulum, Departemen Pendidikan dan Kebudayaan, and The British Council**

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January 1999

## **CCP Programme III - Field Work Consultancy Consultancy Report**

**by Professor Nana Syaodih**

## NSCT REPORT

- Nama of consultant : Nana Syaodih Sukmadinata (Prof. Dr.)
- Assignment : Monitoring of school-based reaserch in three provinces
- Effective date : 10-September 1998 – 6 January 1999
- Activity : Field research in:
1. Maros Sulawesi Selatan 27 Septemb–3 October 1998
  2. Kendal, Jawa Tengah 8 - 14 November 1998
  3. Mataram, NTB 22 - 28 November 1998
- Group member : Group I : Fachrani, Suke Silverius, Darmiasti, Masjudi  
Group II : Muchlisoh, Maria Chatarina Adharti,  
Sutardi, Bunyamin,  
Group III : Mutiara, Sri Hidayati, Sapto Aji Wirantho
- Consultant activities : 1. Accompanying the research groups in research  
preparation and report writing in Puskur Jakarta,  
2. Accompanying the research groups during field work  
in SD and SLTP in each location,  
3. Giving technical support and advice to each research  
groups in the field,  
4. Monitoring research activities in chosen schools,  
5. Doing field research in chosen schools,

### Target attainment

#### 1. Research group member capacity and performance

Almost all of the research group members showed very good performances in their relation with head teachers, teachers, students, parents, and other school

personnels. They worked seriously in data collection through classroom observation, interview and documentation study. Their committed on the time schedule, were very high. They attended the classroom, school and researcher meetings on time. They skills in doing interview and classroom observation, making field notes, data analysis and interpretation were also vary good.

## 2. Research target

Most research target such as: number of the classrooms and subject matters will be observed, number of the student, parent, teacher and head teacher will be interviewed, and number of the documentary data will be collected, had been attained. The primary and secondary data concerning SD and SLTP curriculum development and implementation had been collected by the research group members, through a series of intensive interviews and classroom observations. With these activities the research group members, not only got the complete data concerning the curriculum development and implementation, but they also enhancing their own research capabilities.

# Sulawesi Selatan

# RESEARCH REPORT

Nama : Nana Syaodih Sukmadinata,  
Position : National Short-Term Consultant  
Research Location : Maros, South Sulawesi  
Date : 27 September – 3 October 1998

## A. ACTIVITY

### 1. Consultation activities

- a. Team meeting: research preparation
  - Identified the teachers and the classes will be observed,
  - Identified the parents and the students will be interviewed,
  - Discussed more deeply how to interview parents and students,
  - Discussed more detail how to fill school data sheets.
- b. Team meeting: research finding and analyzing
  - Checked the data has been found by each research members,
  - Sharing experiences in doing observation and interview,
  - Discussed the next activities,
  - Discussed the data analyzing and reporting.
- c. Individual meeting:
  - Asked to each research members about their classroom observation and their interview with parents, students and teachers,
  - Discussed the specific problems faced by each reasearch members,
  - Sharing ideas with research members looking for solving their problems.

### 2. Gathering data:

- a. Activities
  - Observed researchers activities and performances,
  - Observed teaching-learning process,
  - Observed school environment,
  - Interviewed students, parents, teachers and head teachers.
  - Documentations studied of the school data.
- b. Classroom observation (teaching-learning process)
  - Mathematics : grade 1 and 4 (SD)
  - IPS : grade 3 (SD)
  - Bahasa Indonesia : grade 7 and 8 (SLTP)
  - IPA : grade 9 (SLTP)

## B. FINDINGS

### 1. Elementary School

#### a. School condition

*the* SD 30-Lekoala is situated in the rural plain area, about five km from the Maros-city. The large part of school environment is the rice field, the rest are garden and housing. All of the school buildings are semi permanent, old and less care. The school has six classrooms, one head teacher and teacher room, one small library and UKS room, two toilet, three unused teacher houses, and one sport area laid down at the centre of the school buildings. The total wide of this school area are about  $\frac{1}{2}$  ha. 285 students go to this school, and the average number of the class relatively big. The biggest is grade 1 (71 students), the smaller is grade 5 (36 students), the rest are beetwan 42 untill 47 students. There are 8 teachers in the school, six classroom teachers, one religion and one sport teacher, four teachers backgound are SPG/KPG, one SGO, one D1, one D2 and one D3. School facilities are very limited and old , generally every three students sitting on one desk. Paket books are not sufficient for the classes, the average were about  $\frac{3}{4}$  of each classes, and there are only one or two students have the supporting book by their own. Teaching media was very rarely, grade five and six had some old maps and pictures. Another grades had one or two hero pictures. Globe, torso, kits, and others teaching aid hadn't found along the observation.

#### b. Curriculum implementation

In SD 30 Lekoala, teachers have read Book One (Foundation, Program and Development) and Book Two ( Basic Course Outline/BCO) of the grade on their responsibility. Based on that BCO they choose the Paket book (Buku paket) and made Lesson unit (Satuan pelajaran), and for the next teaching activities they work only with that Paket book and Lesson unit.

*preferred*  
Concerning the teacher perception to curriculum, more teachers in this school frevered to use '84 Curriculum, according to them the curriculum were more complete and detaile, in GBPP each topic has been explained more detail into sub topics and subject description, and each topic has time teaching allocation. One teacher "guru pemandu" frevered to use '94 Curriculum, in his opinion, this curriculum giving more freedom to the teacher to developed subject content by them selves, to choose the relevant books, and made teachers more creative.

According to the teachers and head teacher in some interviews, they regularly visited the KKG (classroom teachers group work) meeting. In KKG meeting they made teaching preparation, lesson unit and teaching aid, discussed curriculum and some problems they faced in the classroom.

Based on the observations, we found that in the teaching-learning process, more teaching activities dominated by the teachers with the lecturing as the major method.



Some teachers tried to gave more active role to the students, by asking some questions to the class, giving individual exercises as a complementary to their lecturing lessons.

Teaching aid were rarely used by the teachers, although they use its, they choose the simplist and easiest one. No class we observed using book in their teaching-learning process, eventhough more of the students hold Paket book. Classroom management was limited in classical format, there is no grouping and group activities in the exercises as well as in the learning contents discussions. The attention to the individual differences, individual problems and helping was very limited.

In grade one on Mathematics lesson of the topic “Adding number less than ten”, the teacher began her lesson with asking the home work, and evaluated students work one by one. In the apperception stage the teacher ask some questions to the class, and students competed to gave the answer. In the core activity stage the teacher gave a brief explanation about the new topic, gave some example problems and solvings. In the exercise and evaluation stages, the teacher distributed the problem sheets, asked the students to did exercise and made evaluation to the students work one by one. The class size with 71 pupils was very big, it was very difficult for teacher to order the very young student in that number. Classroom situation was very noisy and unmanaged. The nearest and serious students work faster, and the others were playing and cheating. The teacher was very bussy, evaluating the student work, answering the student questions, and helping the slow students.

In grade three on IPS lesson of the topic “Classroom map”, the teacher drew the classroom map on the blackboard. In the apperception stage, she asked to the class about the compass, where were north, east, south and west. In the core activity, teacher gave a brief explanation about the classroom map, the size and the things in side the room. In the exercise stage, the teacher asked student to drew the classroom map on their book, and writing the name of students and things in the fitting colum. In the evaluation stage, some students asked to mention the things or name of student located in each colum, in front of the classroom.

In grade four on Mathematics lesson of the topic “Measuring things with standardized measurement tool”, the teacher began the lesson with asking length measure. The lesson continued with asking the students to use ruler in measuring things (desk, chair, book, floor, etc.), but unfortunately the lesson wasn’t prepared efficiently. Not all of the students brought the ruler, and the more students were confused what should they do in the exercises. The lesson be continued with the exercise of topic “more and less than “. This exercises also gave much confusion to the students. The teacher didn’t explained clearly enough this exercise. The more students got low score in the exercises.

## 2. Secondary School

### a. School condition

The same as SD 30 Lekoala, SLTP 4 Maros is situated in the rural plain area, about four km from kacamatan city, surrounded by rice field, garden and housing. The school

have eleven classrooms, two teacher rooms, one head teacher and administration staff room, one library and UKS room, one guidance and public relation room, one mosque and some teacher houses. Almost all of the buildings are permanent, except the mosque, these buildings are old and less managed. The school have two sport areas, some small class gardens and one wide school garden. The total wide of this school area are about 2 ha, 403 pupils go to this school, got guidance by 30 teachers, six teachers background are S1, four are D3, eight are D2 and twelve are D1. The school facilities are very limited, there are not sufficient paket books for each student in the classes, but some students have the supporting books by their own. Teaching media are very rarely, there are one or two (but uncomplete) IPA kit, using by the teacher as a demonstration tool. Some others audio visual aid, such as maps, globe, and pictures using by the teachers as its needed.

#### b. Curriculum implementation

Curriculum implementation in SLTP 4 Maros, was not much different with SD 30 Lekoala. Generally, teachers have read Book One (Foundation, Program and Development) and Book Two ( Basic Course Outline/BCO) of the course of study on their responsibility. Based on the BCO they choose the Paket book (Buku paket) and made Lesson unit (Satuan pelajaran), and then for the next teaching activities they work with that Paket book and Lesson unit. and scarcely looked at the curriculum (BCO).

Concerning teacher perception to curriculum, there were two group in SLTP, one group (according to researcher the more bright group) frevered to use '94 Curriculum, according to them this curriculum giving more freedom to the teacher to developed subject content by them selves, choosing the relevant books, and made teachers more creative. The other group (the less bright group) frevered to use '84 Curriculum, in their opinion the curriculum were more complete and detaile, in GBPP each topic has been explained more detail, devided into sub topics and subject description, and eah topic has time teaching allocation.

According to the teachers and head teacher in some interviews, they regularly visited the MGBS (course of study teachers group work) meeting. In MGBS meeting they made teaching preparation, lesson unit and teaching aid, discussed curriculum content and some problems they faced in the classroom.

Based on the observations, we found that in the teaching-learning process, more teaching activities dominated by the teachers with the lecturing as the major method. Some teachers tried to gave more active role to the students, by asking some questions to the class, giving individual exercises as a complementary to their lecturing lessons.

Utilazing of teaching aid was very rarely, although they use its, they choose the simplist and easiest one. Classroom management was limited in classical format, there was no grouping and group activities in the exercises as well as in the learning content discussions. The attention to the individual differences, individual problems and helping were very limited.

In grade 7 on Bahasa Indonesia: Reading, the teacher began the lesson with writing the theme and sub theme of the lesson, the objectives and textbook. Without the apperception stage or activity, she directly went to the core activity, explaining new subject "understanding reading". One student was asked to read the reading material, when the student had finished her reading, the teacher explained reading content: "looked at the main ideas and explaining ideas" of the reading. In the exercise stage the student work in pair, discussing reading content, looked at the main ideas and explaining ideas. While the students were working, the teacher went around the classroom to monitor and help the students. In the evaluation stage, some students were asked to reported their work result to the class. Although, the chance to reported work result were limited to the certain students, might be the bright one, but the whole teaching-learning process was very good. The teacher has mastered the teaching content, teaching method and teaching-learning scenarios, student were very actived in discussing and reporting learning content.

Grade 8 on Bahasa Indonesia, Reading poetry. The teacher background was English, she teach Bahasa Indonesia as an additional task. Without apperception activity, the teacher directly went to the core activity, discussing a poem couplet by couplet. The students asked to grasp the message of each couplet, and explained the message to the class. Class situation relatively passive, no much students to put up their hand asking turn to speak. This class situation, might be related with the teacher performance. Along the teaching-learning process, the teacher sitting in her chair, asking students to speak, reading and explaing the couplet orally. She entirely didn't used the blackboard, and used the paket book as the reading subject.

In grade 9 on IPA lesson: Counting electricity bill, as an apperception stage the teacher began his lesson with repeating electricity power through question-answer process. In the core activity the teacher explained new subject with some examples, how to count electricity bill. In the exercise stage, she asked the students to count some electricity bill problems. While student doing their work, the teacher let students to solve problems by themselves. There wasn't monitoring as well as helping by the teacher. In the evaluation stage, the teacher solved problems (counted the bill) by himself, the students asked to evaluted their own work by themselves.

### C. CONCLUSION

Generally the teachers read the curriculum at the beginning of the curriculum implementation. For the next activities, they work with books and lesson units, and scarcely looked again at the curriculum documents.

A group of teacher, the more bright teacher frevered to use '94 Curriculum, this curriculum according to them giving more freedom to developed subject content by them selves, choosing the relevant books, and made teachers more creative. The other group, the less bright frevered to use '84 Curriculum, in their opinion the curriculum were more complete and detaile, in GBPP each topic has been explained more detail, and eah topic has time teaching allocation.

In SD the efforts to use teaching aid were seen, even though it was limited at the easiest and simplest things. In SLTP more teachers interested in using packet books than teaching aid.

In SD as well as SLTP teaching-learning process was dominated by the teachers, with lecturing as the major method. Some efforts to activate students was seen, even though it was limited in the classical format.

Not all of the teaching stages were followed by the teachers; much teacher left the apperception stage, but core and exercise activities, had been done by almost all of the teachers. The evaluation stage generally limited to the evaluation of the exercises work.

The efforts to activate student through group activities and direct experiences such as observations, experiments, field studies, discussion, simulation, role playing, etc. hardly unobserved.

Some factors to be the backgrounds of the teaching-learning competences, especially the educational background, guidance from head teacher, supervisor, their activities in the KKG/MBGS, the efforts and motivation of the teacher themselves.

#### D. RECOMMENDATION

To have the more complete and comprehensive data about the weaknesses of '94 Curriculum, it needed the more comprehensive and detailed evaluation of the whole components of the curriculum, and its supporting factors, including curriculum (documents and implementation), teacher (perception, competence and performance), teaching (media and resources), school (facilities, budget, management, climate and society participation).

For enhancing the teaching quality and teachers competence and performance, the systematic well prepare training and guidance were needed. The training could be conducted at the provincial as well as kabupaten/kotorya level, and the guidance could be conducted at kecamatan, gugus and school level, by specialist, master trainers, master teachers, and experienced teachers.

Approved by CCP Long Term Advisor

(Dr. Liz Sweeting)

# Jawa Tengah

# RESEARCH REPORT

Nama : Nana Syaodih Sukmadinata,  
Position : National Short-Term Consultant  
Research Location : Kendal, Central Java  
Date : 9 – 14 Nopember 1998

## A. ACTIVITIY

1. Administrative procedures:
  - Visited Kanwil Dikbud Jawa Tengah, meeting with Kabid Dikmenum and Kabid Dikdas and staffs,
  - Visited Kandep Dikbud Kendal, meeting with Kakandep and staffs
2. Consultation activities
  - a. Team meeting: research preparation
    - Identified the teachers and the classes will be observed,
    - Identified the parents and the students will be interviewed,
    - Discussed more deeply how to interview parents and students,
    - Discussed more detail how to fill school data sheets.
  - b. Team meeting: research finding and analysing
    - Checked the data has been found by each research members,
    - Sharing experiences in doing observation and interview,
    - Discussed the next activities,
    - Discussed the data analysing and reporting.
  - c. Individual meeting:
    - Asked to the research members about their classroom observation and interview with parents, students and teachers and head teacher,
    - Discussed the specific problems faced by each reasearch member,
    - Sharing ideas with research members looking for solving their problems.
3. Gathering data:
  - a. Activities
    - Observed researcher activities and performances,
    - Observed teaching-learning process,
    - Observed school environment,
    - Interviewed students, parents, teachers and head teacher.
    - Documentation studied of the school data.

- b. Classroom observation (teaching-learning process)
  - Matematika : grade 1 and 5 (SD)
  - Bahasa Indonesia : grade 1 and 4 (SD)
  - Bahasa Inggris : grade 7 and 9 (SLTP)
  - IPS : grade 7 and 9 (SLTP)

## **B. FINDINGS**

### **1. Elementary School**

#### **a. School condition**

SD Nolakerto I Kaliwungu is situated in the rural area, about two km from kecamatan city of Kaliwungu, and ten km from kabupaten city of Kendal, Central Java Province. The school location is very closed to Texmaco Textile Industry, a part of the student parents are textile industry workers, and another part are farmers and traders. The large part of school environment is garden, the rest are rice field and housing. All of the school buildings are semi permanent, old, less care and rather dirty. The school has five classrooms, one head teacher and teacher room, one small UKS room, two toilets, one school guard house, and one sport and school ceremony area laid down in front of the school buildings. The total wide of this school area are about 800 m<sup>2</sup>. The school has 238 students, grade one 54 students, grade two 32 students, grade three 36 students, grade four 41 students, grade five 43 students and grade six 32 students, about 55% of them are girls.

There are only 5 teachers in this school, one head teacher and one school guard. The Religion and sport teacher coming from another school as the helping teachers. All of the teachers and head teacher background were SPG, no one of them got the D2 (PGSD) certificate. School facilities were very limited and old, generally every three students sitting on one desk, in grade one some of five students sitting on one long desk. Paket books were not sufficient for the classes, the average were about ½ of each classes, and there were only one or two students had the supporting books. Teaching media was very rarely, grade five and six had some old maps and pictures. Another grades had one or two hero pictures. Globe, torso, kits, and others teaching aid hadn't found along the observation.

#### **b. Curriculum implementation**

In SD Nolakerto I, generally teachers haven't yet read Book One (Foundation, Program and Development) and Book Three (Implementation Guide), one or two teachers have read Book Two (Basic Course Outline/BCO) of the grade on their responsibility. The teachers generally didn't make teaching preparation by their own self, they got the program cawu (four months program), analisis materi pengajaran (teaching content analysis) and persiapan mengajar (lesson plan) from Kanwil, done by Kanwil Team. These teaching preparation documents are using in the whole schools in Central Java Province. Their daily teaching activities based on the general lesson preparation and paket books, not on their own lesson plan.

Concerning the teacher perception of curriculum, generally they couldn't see the different characteristics of The '84 Curriculum and The '94 Curriculum. According to them both curriculum were the same. In the researcher opinion, this perception was closely related to the above condition, the teachers generally haven't yet read the original curriculum. They only got and read the Kanwil made curriculum (teaching preparation). These curriculum (teaching preparation) essentially were same as they had and done before ('84 Curriculum).

According to the teachers and head teacher in some interviews, they regularly visited the KKG (classroom teachers group work) meeting. In KKG meeting they made some teaching preparation, the teaching aids, discussed curriculum, teaching preparation documents made by Kanwil and some problems they faced in the classroom.

Based on the classroom observations, we found that in the teaching-learning process, more teaching activities dominated by the teachers with the lecturing as the major method. Some teachers tried to give more active role to the students, by asking some questions to the class, giving individual exercises as the complementary to their lecturing lessons. Student response usually classical, they shouted together, one or two teachers, in some occasion gave an individual chance to the student.

Teaching aid were rarely used by the teachers, although they use it, they choose the simplest and easiest one. There were only one class of four classes we observed, using book in their teaching-learning process, even though more students hold Paket Book. Classroom management was limited in classical format, there was no grouping or group activities in the exercises as well as in the subject contents discussions. The attention to the individual differences, problems and remedials were very limited.

In grade one, on Bahasa Indonesia: reading lesson, the teacher wrote some words in printed type on the blackboard, such as: ani, umi, ibu, bibi, etc. The students asked to read it together, and then students one by one read it in front of the class. The teacher wrote some other words, both in printed and written type, the students asked to read it together, but some of them were not concentrate on the lesson, there were many students went out of the class. Then the teacher distributed students exercise book, and asked the students to write words on their exercise book. Along the exercise time, the teacher went around the class, looked at the student work, and gave some helps. Some students work faster, they finished their work quickly, and then started to disturb their friends and made noisy. The teacher voice was very slow, she looked very tired and wasn't have concentration on her teaching.

In the same grade with the same teacher (grade one) on Mathematics lesson of the topic "Adding number less than ten", the teacher began her lesson with writing 10 sums of the two numbers adding. Then she asked the student to read and do the sums orally, and the students shouted together. The teacher continued the same techniques with another new sums.

The teacher wrote number 11 until 20, and gave sum of  $9 + 5 = \dots$ , she took 9 small sticks in her right hand and 5 in her left hand, showed it to the students, and asked



students to count its orally. She continued this techniques with another two sums. Along this process the student looked at and counted the teacher sticks, they didn't take and count their own stick, although most of them had its.

In the next activities, the teacher wrote sum of  $6 + 5 = \dots$ , three students asked to come in front of the classroom. The first student hold 6 small sticks, the second hold 5 sticks and the third took the sticks from the first and the second student, and counted its all. The excercises continued with other two sums.

In the next excercises, the teacher wrote some others additional sum on the balckboard, for intance  $6 + 7 = \dots$ . The students asked to use their own small stick, and hold 6 sticks on their right hand and 7 sticks in their left hand, they counted orally the sum of its. After finishing three excercises, the teacher asked students to do another five sums and wrote the solution on their books. The teacher went around, looked at the student work, help them and evaluated the result one by one. Classroom situation life enough, the students looked feel happy and work seriously.

In grade four on Bahasa Indonesia, the topic was "Writing the letter", the teacher started her lesson with distributing postcards. Then the teacher explained the parts of the postcard, such as the reception address, the sending, and the main part of the letter. The teacher gave the example, how to write reception address, the sending and the letter content, including how to write the place and the time (date, month, and year), saluting, letter content, and the sender sign.

The students asked to write the same letter, as the teacher had done. Some student made it very similar, because they made the same note, when the teacher was explaining. The teacher went around the classroom, looked at the students work, and gave some helps. Most of the students were enthusiastic in this lesson, they work seriously and looked happy. According to some students this lesson in very useful, they can use it in their life.

In grade five on Mathematics lesson of the topic " Adding fraction number ", the teacher began his lesson with discussing students homework. He wrote the sum number one on the blackboard, and explained the way to solve that sum through discussion with the class.

$$3 \frac{2}{3} + 4 \frac{3}{4} = 3 \frac{8}{12} + 4 \frac{9}{12} = 7 \frac{17}{12} = 8 \frac{5}{12}$$

Then the teacher explained the sum number two and three. For the sum number four and five, two student asked by the teacher to write the answer on the blackboard.

The teacher gave new other sum "adding three fraction number". He wrote two sums on the blackboard, and explained the way to do the sum through discussion with the class. And then he wrote other three sums on the blackboard, and asked three students write the answers on the blackboard. Two students did the wrong way, and the teacher helped them until they found the right once. Almost on every steps of the way to do the sum, the teacher asked to class whether they had been understood the way or no.

After all of the students understood the way (to do the sum), the teacher gave five new sums from paket book, and they did its on their exercise book. No observation neither help did by the teacher along the exercise time. After all of the students finished their work, the teacher asked the students to exchange their work with their friend. Some student asked to write the answer on the blackboard. The other students evaluated their friend work. The teacher noted the score of each students on his evaluation book.

## **2. Secondary School**

### **a. School condition**

SLTP I Kaliwungu, Kendal has two campuses, both are located in the rural housing area, about two km from kacamatan city of Kaliwungu , or 10 km from kabupaten city of Kendal, Central Java Province. The distance between these two campuses are about 500 m, the west campus is smaller than the east. The west campus is about 8.000 m<sup>2</sup> wide, some old buildings stood on it, such as: 6 classrooms, one teachers and head teacher room and one administration staff room. Almost all of the buildings are permanent, but less cared and some part of its were brooken. In front of the school there is a wide yard, it can be used by the school for some sort of sport exercises. The east campus is larger then the west, the total wide is about 20.000 m<sup>2</sup>, it has 13 classrooms, one teacher room, library, laboratorium, counseling, mosque, cafetaria, administration staff, and some toilets. This campus has also a school yard which can be used for sport and school ceremony, and some gardens.

At this time the school has 974 students with 72 teachers and 8 administration staffs. Most of the teacher background are D2 and D3, some of them are S1. The school facilities are limited, there aren't sufficient paket books for the student in the classes, but some students have their own supporting books. There are some teaching media, such as microscope, torso, IPA kits, maps, globe, and some pictures. Usually teachers use these media as the demonstration tool in the teaching-learning process, .

### **b. Curriculum implementation**

Generally the teachers had seen the GBPP (Basic Course Outline), but only some of them had read it completely. In the teaching and lerning process most of the teachers hold books and teaching perparation made by MGMP as the teaching-learning guide. Generally they didn't make teaching preparation by them selves, they use ready made lesson unit. Kanwil Dikbud had been pinted out the core team of teachers to develop quarter programs, content analysis and lesson units for each subjects matter for all schools in Central Java Province.

Concerning the teacher perception of curriculum, there were two groups in SLTP, one group (according to researcher the more bright group) prefered to use The '94 Curriculum. According to them this curriculum giving more freedom to the teachers in developing subject content by them selves, choosing the relevant books, and made teachers more creative. The other group (the less bright group) prefered to use The '84

Curriculum, in their opinion the curriculum were more complete and detailed, in GBPP each topic had been explained more detail, its divided into sub topics and subject description, and each topic has had time teaching allocation.

According to the teachers and head teacher in some interviews, they regularly visited the MGMP (course study teachers group work) meeting. In MGMP meeting they discussed curriculum and teaching problems, teaching preparations, lesson units, evaluation, and classroom management, developing teaching aids and items test.

Based on the observations, we found that in the teaching-learning process, more teaching activities dominated by the teachers with the lecturing as the major method. Some teachers tried to give more active role to the students, by asking some questions to the class, giving individual exercises as the complementary to their lecturing lessons.

The utilizing of teaching aid was very rarely, although they use it, they choose the simplest and easiest one. Classroom management was limited in classical format, there was no grouping or group activities in the exercises as well as in the subject content discussions. The attention to the individual differences, problems and remedial were very limited.

In grade 7F on English : Reading comprehension lesson, the topic was Profession. The teacher began her lesson with asking the students (class) what day was today, yesterday and tomorrow. She also asking some kind of profession in the school and in hospital. Teacher wrote and pronounce some other profession, such as Green grocer, Tailor, Sailor, Hair dresser, etc. She made some discussion with the class, about the meaning in Bahasa Indonesia, another examples of profession known by the students.

In the next activities, the teacher discussed the homework. Some students asked to write their homework (sentences) on the blackboard and read it. The teacher made some comments and corrections on it. In these discussion there were no chance for students to express their opinions. The other homework collected by the teacher for the correction.

In the next step, the teacher read some questions from the book, explained the meaning on Bahasa Indonesia, then asked the students to answer those questions, in the long as well as short answer types. For the first time the students answer the question orally, and then they made the answers on their books.

The teacher continued her lesson with completion exercises. The students asked to complete the sentences from the book. Along these exercise the teacher went around observe and gave some helps. After all of the students finished their works, the teacher ask students to exchange their works. Some student went to the blackboard to write their work, another students evaluated their friend works.

In grade 7A on IPS Demographic lesson, of the topic Human man power, the teacher began his lesson with explaining the meaning of demography. And then he continued his lesson with the new subject, including: the development of population in some

provinces and in Indonesia, population census and survey, migration, transmigration, and population/demographic problems.

Almost along the teaching-learning process, the teacher was sitting in his chair, explaining the lesson, reading some materials from book and made discussion with students. Sometime he stood and wrote on the blackboard. Class situation relatively passive, no students put up their hand asking the question. In some occasion there were no respon to the teacher questions, the teacher answer his own questions.

In grade 9 on English: Reading lesson, with the topic Ancient Olympic Games. The teacher asked some students to read the reading material, and then the teacher repeated to read the reading, made some correction, explaining the meaning of some words and sentences, looked for the difference with modern Olympic games. In these lesson, the teacher focused her teaching not only on the language but also on the content. In the next step the teacher read some questions from the book, and asked the students to made the answers orally. After finishing some questions, with these technique, the teacher asked the students to write the answer of the questions in the book.

The teacher continued her lesson with sentence compotision exercise. The teacher gave some examples by herself, and then she asked the students to do the exercise from the book. Along the exercise periode, the teacher went around the classroom, but she didn't give any individual help to the student, the student tried to do and solve problems by themselves. At the end of the exercises, the teacher asked the student to exchange their work, some student wrote their work on the blackboard, and the other student made correction to their friends work.

In grade 9 on IPS Economic lesson: Counting montly interst, the teacher began his lesson with explaining the interset, the elements of counting interest. The teacher gave some examples of problem and the procedure to count the interest. Some students asked came to the blackboard doing exercise counting the interest. After all the students understood the procedure the teacher gave five interst counting problems. The students did the exercise in their book. Along the exercise periode the teacher went around, looked at the students work and gave any help.

After the most students finishing their work, the teacher gave another five new problems, the rather difficult problems, theses were "the time was not in yearly or montly periode, but in daily, the capital is not in single sort but two, three or four".

At the end of the exercise the teacher asked the students to exchange their work. The teacher wrote the answers and the student did the correction.

### **C. CONCLUSION**

Generally each schools have had the '94 Curriculum, but there were only small part of the teacher had read those curriculum. Most of them have had Quarter Program, Content Analysis and Lesson Unit made by Core team of teachers or MGMP. Some teachers made adjustment in the application, but the others implement it as it was. Beside the ready made lesson unit they also used Paket Book as the guide and sources for their teaching.

A group of teachers, the more bright ones preferred to use '94 Curriculum, according to them, this curriculum giving more freedom to the teachers in developing subject content, choosing the relevant books, and made teachers more creative. The other group, the less bright ones preferred to use '84 Curriculum, in their opinion the curriculum were more complete and detailed, in GBPP each topics has been explained more detail, and each topic has the time teaching allocation.

In SD as well as SLTP some efforts in using teaching aids have been seen, even though it was limited at the easiest and simplest things. Generally the teachers interested in using paket books than teaching aids.

In both degrees of school (SD and SLTP) teaching-learning process was dominated by the teachers, with lecturing as the major method. Some efforts to activate students were seen, even though it was limited in the classical format.

Not all of the teaching stages were followed by the teachers, many teachers left the apperception stage, but core and exercise activities, had been done by almost all of the teachers. The evaluation stage generally limited in scoring the exercises work result.

Some efforts to activate student through group activities and direct experiences such as observations, experiments, field studies, discussions, simulations, role playing, etc. hardly unobserved.

Some factors had been contributed as the backgrounds of the teaching-learning competences, especially the educational background, guidance from the head teacher and supervisor, their activities in the KKG/MGMP, teachers motivation in enhancing their development, and the economical condition.

### **D. RECOMMENDATION**

The more complete and comprehensive data about The '94 Curriculum weaknesses are needed, the more comprehensive and detailed evaluation of the whole curriculum components, and its supporting factors including: curriculum (documents and implementation), teacher (perception, competence and performance), teaching (media and resources), school (facilities, budget, management, climate and society participation) should be done.

For enhancing the teaching-learning quality and teachers competence and performnace, the systematic well prepared training and guidance are needed. The training could be conducted at the provincial as well as kabupaten/kodya level, and the guidance could be conducted at the kecamatan, gugus and school level, by the educational specialist, master trainers, master teachers, and experienced teachers. Qualified education need the available school facilities and media., and teacher motivation could be raised by improving their economic condition.

Jakarta 2 December 1998  
Approved by CCP Long Term Advisor

(Dr. Liz Sweeting)

# Nusa Tenggara Barat

# RESEARCH REPORT

Nama : Nana Syaodih Sukmadinata,  
Position : National Short-Term Consultant  
Research Location : Mataram, Nusa Tenggara Barat  
Date : 23 – 28 November 1998

## A. ACTIVITY

### 1. Consultation activities

- a. Team meeting: research preparation
  - Identified the teachers and the classes will be observed,
  - Identified the parents and the students will be interviewed,
  - Discussed more deeply how to interview parents and students, teachers and head teacher,
  - Discussed more detail how to fill school data sheets.
- b. Team meeting: research finding and analysing
  - Checked the data has been found by each research members,
  - Sharing experiences in doing observation and interview,
  - Discussed the next activities,
  - Discussed data analysing and reporting.
- c. Individual meeting:
  - Asked the research members about their classroom observation and interview with parents, students and teachers, and head teacher,
  - Discussed the specific problems faced by each reasearch member,
  - Sharing ideas with research members looking for solving their problems.

### 2. Gathering data:

- a. Activities
  - Observed researcher activities and performances,
  - Observed teaching-learning process,
  - Observed school environment,
  - Interviewed students, parents, teachers and head teachers.
  - Documentation studied of the school data.
- b. Classroom observation (teaching-learning process)
  - Matematika : grade 1 and 3 (SD)
  - Bahasa Indonesia : grade 1 and 3 (SD)
  - Bahasa Inggris : grade 8 (SLTP)
  - IPA : grade 8 and 9 (SLTP)



## **B. FINDINGS**

### **1. Elementary School**

#### **a. School condition**

SD 4 Narmada is located in the rural area, about one km from the Narmada kecamatan city. The large part of school environment are housing, the rest are gardens. All of the school buildings are semi permanent, old and less care. The school has six classrooms, one head teacher, teacher and UKS room, two toilets, two teacher houses resided by school guard. and one schoolyard utilized for sport exercise, school ceremony and playground. Some tall trees stand sheltering the schoolyard. The total wide of this school area are about 2.000 m<sup>2</sup>. The school has 257 students and 9 teachers ( 7 classroom teachers, one sport and one religion teacher). The teacher background are variated, 3 teachers background are D2, one teacher S1 dan the rest are SPG.

The average number of the classes relatively big. The biggest is grade 4 (50 students), the smaller is grade 1 (33 students), the rest are beetwan 37 untill 48 students. School facilities are very limited and old , generally two students sitting on one desk, but in some classes three students on one desk. Paket books are not sufficient for all student, the average were about  $\frac{3}{4}$  of each classes, and there were only one or two students had their own supporting book. Teaching media was very rarely, grade five and six had some old maps and pictures one globe. Another grades had one or two hero pictures.

#### **b. Curriculum implementation**

In SD 4 Narmada, some teachers have read Curriculum Document, especially Book Two GBPP (Basic Course Outline or BCO) of the grade on their responsibility. Some other teachers haven't read it. Their teaching activities based on Program Cawu, Analisis materi pelajaran and Persiapan Mengajar made by Gugus in KKG. Concerning the teacher perception on curriculum, more teachers in this school preferred to use The '94 Curriculum, in their opinion, this curriculum giving more freedom to teacher developed subject content by them selves, activated students, choose the relevant books, and made teachers more creative.

Some teachers preferred to used The '84 Curriculum. According to them that curriculum were more complete and detaile, in GBPP each topics has been explained more detail into sub topics and subject description, and each topics has time teaching allocation.

According to the head teacher and teachers in some interviews, the teachers regularly visited the KKG (classroom teachers group work) meeting. In these meeting they made some teaching preparation, improving lesson units, developing teaching aids, discussing some curriculum and teaching problems they faced in the classroom.

Based on the observations, we found that in the teaching-learning process, more teaching activities dominated by the teachers with the lecturing as the major method. Some teachers tried to gave more active role to the students, by asking some questions, giving individual exercises, group working and discussion as the complementary to their lecturing lessons.

Teaching aids were rarely used by the teachers, although they use its, they choose the simplist and easiest one. More class we observed, using book in their teaching-learning process, eventhough they used its as the exercise sources. In the classroom management generally they used classical format. There hardly no grouping or group activities in the exercises as well as subject contents discussions. Attention to the individual differences, problems and remedial were very limited.

In grade one on Mathematics lesson of the topic “Adding number of two and one”, the teacher began his lesson with giving the examples. He wrote some sums, and procedure of solve its , such as:

$$\begin{array}{rcl} 14 + 1 = \dots\dots & 14 & = 10 + 4 \\ & & \quad 1 + \\ & \text{-----} & \\ & 10 + 5 & = 15 \end{array}$$

The teacher gave some exercises, and the students doing its on their exercise books. After its had finished, the student took their work to the teacher, and the teacher doing some corrections and gave the score. Some general weaknesses or wrong, were discussed by the teacher.

The teacher gave some other new sums, one by one student doing it on the blackboard, and the others doing its on their exercise book. While the students working, the teacher go around the classroom, observed the students work, gave some guidance and corrections. The teacher voice was very loud, whether he spook to the class or to the individuial, eventough some students who had finished their work, spook one with another, went from one desk to other desk or went out the classroom, these made classroom situation be noisy. When one student doing the exercise on the blackboard, another students went in to and arounded him.

In the same grade (grade one) on Bahasa Indonesia: Reading Lesson of the topic “ The Day and the Night “ , the teacher began his lesson with discussing the homework. He asked who can write the story on the blackboard. Some students put up their hands, and the teacher asked a student to come in front of the class and write the story. The teacher read the story made by the student, made some comments and corrections. The same activities repeated by the teacher until all of the homework been finished.

The next step teacher began with new activity, distrubuted the books, one book for two students. The students looked happy got the book. They asked what page will be studied, he asked to open page 17. The teacher asking topic of the story, and then discussing pictures relating with the story one by one (four pictures). The students

answered together orally. The teacher went around the class discussing pictures with each row of students. While the teacher doing discussion with one row, the other rows being noisy.

The teacher continued the lesson with another exercise, completing the sentences. The sentences still relating with the pictures of the last exercise, but some words were ommited. The teacher read the sentence loudly, and asked to the student what was the completion, and the student shouting together. One sentence relating with the sun shine, the teacher asked the students went out the classroom and looking at the sun shine. The students looked happy to do it. The students back to their desk, and the teacher continued reading the next sentences. After all of the sentences had been finished, the teacher asked students repeated reading the sentences.

In grade three on Mathematics lesson of the topic “Multiplication the number one with the number of ten: the long method”, the teacher began the lesson with writing the sum and its solving on the blackboard, such as:

$$3 \times 30 = \dots\dots \quad 3 \times 30 = 10 + 10 + 10 = 30.$$

The teacher wrote 10 sums on the blackboard, and asked the students to do the sums as in the examples After all of the students finished their work, the teacher asked to exchange students work, and some students went in front of the classroom to write the answers. Each student corrected their’s friend work, and brought to the teacher for scoring.

In the next step the teacher gave another axercise,

$$4 \times 20 = \dots\dots \quad 4 \times 20 = 20 + 20 + 20 + 20 = 80$$

Two students asked to do the sums on the blackboard, and another students do its on their book. After all of the students understood the procedure of the long method, the teacher wrote 15 sums for the homework.

In grade three on Bahasa Indonesia: Reading lesson, the topic was “Carying environment”. As an introduction, the teacher discussing the need of carying environment, started with classroom and school environment.

Then the teacher distributed Bahasa Indonesia Book, one book for two student. The teacher asked the student to read silently. But about two minnuts later, the teacher changed the activity. The teacher read the story loudly and asked the students to hear carefully. After she finished a half of the story then she asked the student to continue the reading. Some students asked how to answer the questions, the teacher explained that the student should read the story first, and don’t looked at the question. While the students reading the book, the teacher stayed in her place, she didn’t looked at and gave some helps or corrections to her students.

Who had finished the reading, they can continue to read answer the questions. After all of the students finished their work (answering the questions), the teacher asked students

to exchange it. Some students one by one wrote their answer on the blackboard, and the other students corrected their friend work. The class situation relatively good, the students learned orderly, silent but active. Most of the students were critical enough, they asked when they found the new words or wrong answer.

## **2. Secondary School**

### **a. School condition**

SLTP 3 Narmada, Mataram is located in the rural plain area, about three km from Kacamatan city of Narmada, surrounded by housing, gardens and some rice fields. The school has twelve classrooms, one room of science laboratory, library, guidance and counseling, school health unit, head teacher, teachers, and administration staff room. All of the buildings were permanent, relatively new, clean and well managed. The floor is ubin, good and clean, the light and ventilation are very good. The school planning is very good, the rooms are built cycling in the units or couples, one unit or couple consists of two or three rooms. The distance between two units is far enough, made the rooms are light and healthy. In the center of the buildings laid down the wide schoolyard surrounded by some small gardens with some trees and flowers on it. Unfortunately almost all of the trees are short, made the campus still hot and bright. Maybe in five or ten years later all the trees will be growing tall, and made the campus colder and less bright. The total width of this school area is about 4 ha.

To day the school has 742 students, grade one 252 students, grade two 254 and grade three 236 students, divided into 18 groups of classes. Grade one studies in the evening (13.00-18.00). The school has 70 teachers, and seven administrative staffs. Most of the teachers' background are D2 and D3, the rest are S1. The school has some facilities, although the kind and number are still limited. They have all kinds of Paket Books, but the number is limited, generally only 50% - 80% of the students. A number of students had some supporting books. The teaching media are also limited. They have some media for science, social study, language, mathematics, and some other subjects, but the number is limited.

### **b. Curriculum implementation**

The teachers of SLTP 3 Narmada generally have read the '94 curriculum, especially book two GBPP (Basic Course Outline or BCO), but only a small part of them read the document intensively. Based on the GBPP they developed Quarter Program, Content Analysis and Lesson Unit in MGMP (subject matter teacher group work) meeting. In the next teaching activities they work with that Lesson Unit and the Paket Book scarcely looked at the curriculum (BCO). There were only one or two teachers who had read Book One (Foundation, Program and Development) and Book Three (Curriculum Guides).

Concerning the teacher perception of curriculum, there were two groups in SLTP, one group (according to researcher the more bright group) preferred to use The '94

Curriculum. According to them this curriculum giving more freedom to the teacher developing subject content by them selves, choosing the relevant books, and made teachers more creative. The other group (the less bright group) preferred to use The '84 Curriculum, in their opinion the curriculum were more complete and detailed, in GBPP each topics had been explained more detail, its divided into sub topics and subject description, and each topics had the time teaching allocation.

According to the teachers and head teacher in some interviews, they regularly visited the MGMP meeting. In these meeting they made teaching preparations, lesson units and teaching aids, discussed some curriculum content and problems, they faced in the classroom.

Based on the observations, we found that in the teaching-learning process, more teaching activities dominated by the teachers with the lecturing and question-answer as the major methods. Some teachers tried to gave more active role to the students, by doing discussion and giving individual exercises as the complementary to their lecturing lessons.

The utilizing of teaching aid were limited, although they use its, they choose the common tools, the simplest and easiest one. In the classroom management most of the teachers used the classical format, there was only one teacher we observed, doing the group work, even though in realization they work individually in group. The attention to the individual differences, problems and remedial were very limited.

In grade 8 on Bahasa Inggris: Reading, the teacher began his lesson with explaining the reading. He explained some new and unfamiliar words, writing, translating and discussing the words with students.

The lesson continued with the next step answering the question. The teacher read the question, translate it into Bahasa Indonesia, and asked the students to answer. After finishing three questions, the teacher asked the students to answer another three questions from the Paket Book on their exercise book.

Three students asked to write their answers on the blackboard, for example:

Is Doni's school far from his house? Yes I do (wrong) Yes it is (right)

The teacher read the answer, and made some corrections in the discussion with the class. The students do the correction of their own work.

The next lesson was dialog. The teacher explained some new and unfamiliar words, translated and discussed its with the students. The class divided into groups. Each groups consist of four or five students. The groups doing the dialog following the dialog reading on the book. The teacher went around the group, observing students activities, gave some correction and motivation. Not all of the groups work seriously, some group work lazy, unconcentrated, and unmotivated.

The teacher dominated the lesson, less gave the chance to the students to try by themselves, in reading, looking the new and unfamiliar words in the dictionary and doing the dialog.

In grade 8 on IPA Biology: laboratorium activity, the topic was “ the kind of joints”. The teacher put on one human skeleton in front of the laboratorium. The teacher asked students to observe the skeleton from the far. He wrote some questions on the blackboard:

What is joints?

What kind of joints?

What are the definitions of each kinds?

The students gave some definitions of joints! The teacher asked the students to move their wrist, and the teacher moving the wrist on skeleton. The teacher explained some part of human body and showed its on the skeleton, made some discussion with the students.

The teacher put human skeleton picture on the blackboard, and then he showed the kind of joints: the dead, the rolling and the moving joints. He explained each kind of joints, discussed its with the class, or asked the students to give the definitions, and some examples. Two students asked to come in front of the classroom and give some joint moving examples by their own selves. The teacher (and the class of course) still confused, what was the different between rolling joint (sendi putar) with ball joint (sendi peluru). The teacher couldn't give the exact examples of these joints.

The teacher adviced students to read the book and comprehend its carefully. Some students take the notes of the lesson, but most of them were not. What will be explained, were written on the book, but some of its were less clear and to short. Its need another book for enriching the subject, the teacher seem no have enough time to do this. Really this lesson need no laboratorium, all of the activities can be done in the classrom.

In grade 9 on IPA Biologi lesson: laboratorium activitiy, with the topic “ Mamalia Proliferation”. As the apperception activity, the teacher began his teaching with the discussion, repeating the last lesson “insemination”. The teacher asked the questions, such as: what was insemination? What kinds of insemination? Gave the examples of external insemination! Example of internal insemination! etc.

In the core activity, the teacher divided the class into group. Each group consist of five untill six students. Each group discussing (answering) some questions, such as:

- What are the insemination organs of mamalia (rat)?
- Explain the function of each insemination organs of male and female rats!
- Explain, the stages of human embrio development!
- What is the hemaprodit animal? Give an examples of it organic!

Although the students sitting around in the group, but they worked individually. They looked for the answers in their book with out discussion or communication with their group members. After 30 minuts they worked, the teacher asked group one to write their answer of problem number one on the blackboard, and then group two for problem number two, ect. After all of the questions had been finished, the teacher put the rat proliferation picture on the blackboard. He gave some comments on the student works, gave some corretion and showed the organs on the picture.

In these lesson there were no discussion and laboratory activities at all, all students work individually without communication between them, and with out using laboratorium facilities. These condition maybe relating with some factors: 1) the teacher haven't had clear concept about the discussion, 2) the task given to the students were not the problems, which need discussion to solve it, 3) what they had been done was not the laboratorium activities, they can do it in the usual classroom.

### **C. CONCLUSION**

Generally the teachers have read the curriculum (GBPP) at the beginning of the curriculum implementation time, although only some of them have read its intensively. For the next activities, they work with books and lesson units, and scarcely looked at the curriculum (GBPP).

A group of teachers, the more bright ones prefered to use '94 Curriculum, according to them, this curriculum giving more freedom to the teachers in developing subject content, choosing the relevant books, and made teachers more creative. The other group, the less bright ones prefered to use '84 Curriculum, in their opinion the curriculum were more complete and detail, in GBPP each topics has been explained more detail, and eah topic has had the time teaching allocation.

In SD as well as SLTP the efforts of using teaching aids have been seen, eventhough its were limited at the common, easiest and simpliest things. In SLTP more teachers interested in using paket books than teaching aids.

In both school the teaching-learning process was dominated by the teachers, with lecturing and question-answer as the major method. Some efforts to activated students was seen, eventhough it were limited in the classical format.

Not all of the teaching stages were followed by the teachers, many teachers left the apperception stage, but core and exercise activities, had been done by almost all of the teachers. The evaluation stage generally limited in scoring the exercises work result.

The efforts to activated student through group activities and direct experiences such as observations, experiments, field studies, discussions, simulations, role palying, etc. hardly unobserved.

Some factors had been contributed as the backgrounds of the teaching-learning competences, especially the educational background, guidance by the head teacher and supervisor, their activities in the KKG/MGMP, teachers motivation in enchancing their development, and last but not least was the economical condition. Some teachers stated, they can not concentrated on the teaching-learning process because of the economic problems.

#### **D. RECOMMENDATION**

The more complete and comprehensive data about The '94 Curriculum weaknesses, need the more comprehnesive and detail evaluation of the whole curriculum components, and its supporting factors. These including: the curriculum documents and implementation), teachers perception, competence and performance, teaching media and resources, school facilities, budget, management, climate and society participation.

For enchancing the teaching-learning quality and teachers competence and performance, the systematic well prepared training and guidance were needed. The training could be conducted at the provincial as well as kabupaten/kodya level, and the guidance could be conducted at the kecamatan, gugus and school level, by the educational specialist, master trainers, master teachers, and experienced teachers. Teachers motivation could be raised, by the improving of their economic condition and prosperity.

Jakarta 9 December 1998  
Approved by CCP Long Term Advisor

(Elizabeth M. Sweeting, Ph.D)



## E. SCHEDULE

| Date                           | Activity                                                                                                                                                                                                                                            |
|--------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Mon. 23 Nov.98                 | 10.00-12.00 Visited Kanwil Dikbud : meeting with Adm.<br>Coord. Kanwil and Kabid Dikdas Dikbud NTB<br>12.00-14.00 Visited Kandep Dikbud Mataram: meeting with<br>Ka Kandep and staffs,<br>19.00-21.00 Team meeting: discussed research preparation. |
| Tues.24 Nov &<br>Wed.25 Nov 98 | 7.30 -15.00 Nana Syaodih and Sapto Adji doing research in<br>SD 4 Narmada,<br>7.15-15.00 Mutiara and Hidayati doing research in SLTP 3<br>Narmada<br>19.00-21.00 Team meeting: discussed research findings                                          |
| Thur. 26 Nov &<br>27 Nov 98.   | 7.30 – 15.00 Sapto Adji doing research in SD 4 Narmada,<br>7.15 – 15.00 Nana Syaodih, Mutiara and Hidayati doing<br>research in SD 4 Nrmada.<br>19.00-21.00 Team meeting: discussed research findings                                               |
| Sat. 28 Nov 98                 | 7.30-11.00 Sapto Aji doing research in SD 4 Narmada,<br>7.15-11.00 Nana Syaodih, Mutiara and Hidayati doing<br>research in SLTP 3 Narmada<br>12.00-14.00 Visited Kanwil Dikbud NTB & Kandep Dikbud<br>Mataram: Farewell meeting                     |

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