To make the unknown known. Assessment in group work among students

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TO MAKE THE UNKNOWN KNOWN – ASSESSMENT IN GROUP WORK AMONGST STUDENTS

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ABSTRACT

When group work is used as pedagogical practice in compulsory schools, teachers are expected to assess each student's individual knowledge even if learning has been gained in interaction with other students. This can be particularly challenge for teachers, i.e., the dilemma of reconciling the demands for individual assessment while fulfilling the demand to teach cooperation abilities through group work. Earlier studies concerning group work as classroom activity (Forslund Frykedal & Hammar Chiriac, 2010, 2011; Hammar Chiriac & Forslund Frykedal, 2011) reveal that assessment is a highly relevant but challenging factor when organising group work in educational settings. To our knowledge, assessment in group work is a rather neglected research area with very little attention being paid to research about this phenomenon. Previous research therefore provides little theoretical knowledge or useful tools to assist teachers in resolving these apparently conflicting demands. The main focus in this chapter is to present and elucidate our current knowledge about assessment in group work. Some of the aspects considered and problematized in this chapter are:

- Purpose of the assessment;
- What is assessed;
- How the assessment is carried out;
- Which level is in focus – individual level, group level or both;
- How the feedback is implemented; and
- Who is assessing – teacher, students or both.

Furthermore, an empirically grounded model with the purpose of clarifying different aspects of group assessment will be presented. Finally, the chapter is concluded with some pedagogical implications being suggested.

INTRODUCTION

To be able to cooperate and work together with other people in different contexts exercising cooperative abilities, such as, active listening, but also expressing oneself clearly and intelligibly are vital. These abilities need to be practised and developed when working together in groups. Working in groups can also provide opportunities to learn theoretical knowledge, by taking into consideration others perspectives in a subject area as well as presenting one's own perspectives and knowledge. Working in groups also presents possibilities for the creativity and development of ideas in the dynamic process of engaging in discourses with others. The teaching mode above all others that encourages the development of cooperative abilities, shared learning and creativity is *group work.*

The curriculum prescribes that students should be presented with opportunities to learn cooperation abilities and for this reason teachers need to create conditions in which students can meet and work productively together. Even though teachers commonly use group work as a teaching method, they are nevertheless expected to assess student knowledge development in relation to criteria expressed in the curriculum. In many cases, the assessment will pertain to a student's individual knowledge and abilities in situations where learning is accomplished in interaction with others. Teachers are also obliged to assess each student's individual knowledge development in the various subjects. Additionally, teachers are expected to provide students the opportunity to develop the ability to assess their own knowledge and knowledge development. So, while tasks are usually performed in dyads or in groups, individual student knowledge is required to be assessed; this assessment process of reconciling mandatory demands for the individual and the group creates a dilemma for many teachers. (Forslund Frykedal & Hammar Chiriac, 2010, 2011).

As mentioned above, student-centred working methods are often recommended, Students are required to take responsibility for their own learning processes, be active

and interact productively and skilfully with other group members. One important aspect of the learning processes is their ability to reflect upon and assess their the own knowledge development.

It is critical then for teachers to elucidate the *purpose* of the assessment; find ways to carry out the assessment, both *what* will be assessed and *how* the assessment ought to be implemented and *who* is going to conduct the assessment, the teacher or the students. These are important aspects to consider in the implementation of all forms of assessment. As such, the *level* of assessment – individual, group or both – also needs to be taken into consideration when students work in groups as well as how the students are going to give and receive their *feedback.* One challenge with group work assessment is that a joint product is created in a context where a teacher is likely to be involved in a complex process of mediating learning for all the students. So while students may expect to receive on the spot, timely review of their current achievements, including difficulties being experienced, such support at both the individual and group levels may not be immediately accessible. Moreover, teachers are obliged to assess each student's individual knowledge and abilities in a number of curriculum areas. If assessment processes are to be transacted feasibly, students need to become skilled in the self-assessment of their own knowledge and skills, Consequently, the challenge for a teacher is to devolve some responsibility for the assessment to the students, a process which can be conflicting for some teachers used to being in complete control of the assessment process (Black, Harrison, Lee, Marshall & Wiliam, 2003).

The aim of the chapter is to discuss, elucidate and present different aspects relating to assessment in group work. The following aspects will be problematized: a) purpose of the assessment, b) what is assessed, (c) how the assessment is carried out, (d) which level is the focus for the assessment, i.e. individual, group or both, (e) how feedback is implemented, and (f) who is going to assess, i.e. the teacher, students, or both. Furthermore, an empirically grounded model with the purpose of clarifying different aspects of assessment in group will be presented. Finally, the chapter is concluded with some pedagogical implications.

PLAN, IMPLEMENT AND FOLLOW UP THE ASSESSMENT IN GROUP WORK

To facilitate the assessment when using group work it is important for a teacher to construct well-defined objectives, goals and frames for the work and to ensure that they are clear and understandable for the students. Specifically, the knowledge and skills to be developed need to be elucidated as the primary means for facilitatating assessment for both teachers and students. Several studies emphasize the importance for teachers to clarify educational goals as an imperative for making the assessment transparent for the students (Forslund Frykedal, 2008; Hammar Chiriac & Granström, 2009, 2012; Ross & Rolheiser, 2003; Toohey, 2002). Further, teachers need to make transparent for students the learning objectives and, which abilities need to be developed to reach the goals. Based on these goals different components of the assessment process must be planned and organized at the same time as the task is constructed. It is also vital that the teacher clarifies for himself and the students (a) the purpose of the assessment, (b) what is going to be assessed, (c) how the assessment will be carried out, and (d) who is going to assess. Thus, it is essential for the teacher to systematize and elucidate the different parts of the assessment integrated with and matched to the task and the working process; hence, students require clarity what to do in advance, during and after the group work. According to Ross and Rolheiser (2003) there are some key aspects concerning assessment, which a teacher might process when planning for group work assessment. Below are some questions, which need to be considered.

- What is going to be assessed?
- How will the assessment be carried out?
- Should the assessment be directed to the individual student, the group or both?
- How is the assessment related to learning objectivies, criteria and grades?
- Who is going implement the assessment - the teacher, the students or both?

However, we think that Ross and Roheiser (2003) have missed one critical aspect of the assessment process, namely the centrality of feedback in the assessment loop. Information from feedback provides students with knowledge – what is their current learning status and how they might continue their work to reach the prescribed learning objectives. We therefore suggest that this one additional process be considered as an intrinsic part of the assessment process. Crucial for the ongoing learning process and

subsequent success in students reaching the learning objectives resides in a teacher answering the following question:

- How is the feedback implemented?

The key questions posed above can help teachers to systemize the important aspects pertaining to the assessment when using group work as a teaching mode. However, it is likely to benefit both teacher and students, to graduate and stage the implementation process, so students do not become overwhelmed by the process, and thus place the assessment process on a firm footing. It is necessary to accept that time will be required to allow for student learning how to implement the assessment procedures in group work successfully. It is suggested that different parts of the assessment strategy be implemented in company with the group work task. This will ensure that the assessment is contextualized enabling a teacher to model, prompt and reflect upon students' use of components that have been highlighted, to support particular group tasks.

PURPOSE OF THE ASSESSMENT

One of the first thing a teacher has to consider when scheduling group work is to decide the purpose of the assessment, for instance whether the assessment should be summative (Glickman, Gordon & Ross-Gordon, 2009), formative (Black & Wiliam, 1998; Brookhart, 2007) or both. Summative assessment is generally used as a means of ascertaining what a student knows at a particular time (product) for the purpose of providing a grade. Formative assessment is an on-going informing of student progress, learning needs and academic progress during a work unit or task (process) for the purpose of supporting a student's continuous learning. This could be implemented by the teacher prompting a student how progress might be made towards meeting the learning objectives based on teacher observations of progress made and strategies implemented to this point. Thus the teacher is projecting a student forward, sometimes using criteria to clarify for the student and delineate the end point of the "journey" and how this destination might be reached. Although a summative assessment often is carried out as a final assessment it might also be used in formative purpose by acting as a basis and provide an opportunity to look ahead to new learning objectives. Even though research demonstrates that formative assessment is considerably more

supportive for learning, the summative assessment is significantly more commonly used in education. Additionally, summative assessment is often used regarding final assessment as means for, tends to cause competition rather than cooperation and knowledge development among the students (Black, Harrison, Marshall & Wiliam, 2003; Wiliam, Lee, Harrison & Black, 2004). To avoid competition in group work summative assessment and grading need to be used consciously and with caution to avoid triggering competition rather than cooperation.

WHAT IS ASSESSED

In relation to what is assessed, it is appropriate for the teacher to choose one or a few aspects of learning, i.e., skills, outcomes or products as the foci for assessment in implementing each group work activity. A clear distinction needs to be made in relation to the focus of the assessment, i.e., whether the assessment pertains to (a) theoretical knowledge, (b) a product (i.e. a text), (c) cooperative abilities, or (d) a combination of the alternatives. When a teacher is assessing knowledge and abilities in situations where several students are working together in group work, it is also important to consider if the assessment will be implemented at an individual, group or at both levels. Additional considerations for the teacher to attend to, are if the assessment will be accomplished through observing what happens in the interactions between the students, that is, assessing different abilities in cooperative situations, or rather on one student's behaviours when interacting with peers in group contexts. According to Ross and Rodheiser (2003) is it essential for teachers to elucidate whether it is the individual student's ability to contribute to the groups learning process that is supporting the other group members in their development of knowledge and abilities, or if it is the individual student's ability to contribute to productivity i.e., that the group's joint work will be of high quality because of a level of interdependence between members. These two dynamics can produce very different dynamics between group members with consequent different results both at an interpersonal level and in the product or results produced.. If a student is inspiring, challenging, supportive and ensures that everyone is heard and also helps to support the learning process, such a "high-powered" individual may hamper the group's overall productivity and cohesiveness and consequently the group's work produced in common. A well-functioning group based on the input and influence of one high-powered individual may reap a group product that is considered

successful This outcome may however have been achieved at a price that was detrimental to each member taking some responsibility for the contribution of distinctive components reflective of the individuals; such a dynamic may have the effect of reducing the quality of some planned outcomes (e.g., equitable planning in groups). Consequently, it is necessary to elucidate what is to be assessed including the social and group skills pertaining to successful group work. In a nutshell, it is imperative to discern whether the purpose of the group work is to support each individual's learning or whether it is the group's common product that is essential.

HOW THE ASSESSMENT IS CARRIED OUT

The selection of what is assessed will influence how the assessment is carried out (Achacoso & Svinichi, 2004). One issue that teachers need to consider is the formats that will best allow the targeted assessment information to be gathered. These modes include: (a) paper and pencil tasks, e.g. tests and written reports, (b) information technology (IT), e.g. written reports to follow up tasks (c) communication, e.g. oral presentation, formal and informal or (d) observations, for example how students cooperate in groups. In considering the formats to be used, teachers need to also determine the most effective tools for collecting information that will support the ongoing teaching and learning process. Examples include: (a) communication, such as asking carefully constructed questions and then giving verbal feedback to the students, (b) reading the students' submitted paper and pencil documents and providing written feedback, (c) supplying and assessing written tests and /or (d) observe individual students abilities and performances as well as the group's processes and work and subsequently provide verbal and/or written feedback. Having students construct representations (e.g., maps, diagrams, sketches) in log-books can also be an informative way source of assessment information, as well as allowing the students to save their work in a portfolio format.

As a complement to their own summative and formative assessment, teachers can assist the students perform self- and peer assessment. According to Lotan (2008) students' self- and peer assessment of small group work, may be an effective strategy for students to become invested in improving their own work. The main purpose for students employing these assessment methods is to give them opportunities to reflect on their

own learning, which in turn can help them to develop their own knowledge and abilities (Johnston & Miles, 2004; Kuisma, 2007). When teachers allow their students to practice self- and peer assessment, plans for the teaching process needs to include: (a) how to implement the assessment (b) provide a clear structure for accomplishment, and (c) supply clear criteria for what should be assessed. Teachers also need to educate students how to provide their feedback in a supportive, respectful way, thus that not damaging the receivers' sense of competence. Self- and peer assessment can afford students opportunities to develop and be in control of their own learning, but successful implementation requires thoughtful reflection and planning by teachers.

FEEDBACK

One way for the teachers to support the students in their learning is to employ both verbal and written feedback. When using feedback, a teacher's knowledge of the students' abilities is important, and the conveyed feedback must be formulated so that the students understand how it accords with individual learning goals. Hattie and Timperley (2007) have developed a model comprised of four different feedback strategies that provide opportunities to influence students' learning.

The first strategy, which can be used both at an individual and group level, is to deliver constructive comments on the task or product, thereby providing information on how well the task has been completed and what needs to be improved. The second strategy is for a teacher to provide feedback on the process of task completion i.e. course of action pursued in undertaking the task. The third strategy relates to teacher feedback on student capacity for self-assessment and self-regulation. It is about student ability to manage their own work and regulate actions towards achieving their learning goal. It can potentially promote a certain degree of student autonomy and self-discipline. The fourth strategy relates to personal affirmation of peers (or their work) by making comments e.g. "good work". Such generic, unspecific feedback usually contains little or no task specific related information. The teachers' feedback to the students can be conveyed in three different ways (a) Feedback – these are your achievements right now, (b) – Feed up - this what you should be able to do, (c) Feed forward– this is how you can learn to reach your learning objectives. If the feedback strategies are effective they answer the following three questions that can be

asked by both students and teachers; "Where am I in my learning?", "Where am I going?" and "How do I get there?"

WHO IS ASSESSING – THE TEACHER, STUDENTS OR BOTH

Last but not least, the teacher needs to decide who is going to undertake the assessment for the group work, (a) the teacher, (b) the students, or (c) both. When a teacher is planning group work, it is essential to simultaneously consider different parts of the assessment strategy, such as (a) purpose, (b) what, (c) how, (d) level (e) and by whom as well as how the feedback will be communicated to make sure that the assessment is elucidated and is transparent for both teacher and students. These parts are interconnected and depend on each other to create high quality, trustworthy assessment. The teacher has the overall responsibility, but may empower the students by including them in the assessment process. Student involvement in the formative assessment also helps them to develop metacognitive abilities through providing them a window to their own learning.

A THEORETICAL MODEL FOR ASSESSMENT

A recent study involving interviews of Swedish teachers (teaching year 5-9) revealed that it was unclear for teachers what to assess and how to conduct assessment when using group work as a pedagogical method (Forslund Frykedal & Hammar Chiriac, 2010, 2011)[1]. The study also disclosed that teachers did not associate group work with theoretical learning, but as a working method used to train and develop students' cooperative abilities. Thus, above all, the focus for the teachers' assessments were students' participation, contribution and responsibility in the group work as well as their ability to listen and to express themselves clearly, while assessment of students' subject knowledge was rarely mentioned. The teachers used general terms when describing what they assessed and how the assessment were conducted. Moreover, in implementing assessments, they used more informal than formal methods.

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[1] The study, with empirical data from three Swedish schools, has been published in English. Readers who are more interested in the study please refer to read the article. The reference to the article is: Forslund Frykedal, K., & Hammar Chiriac, E. (2011). Assessment of students' learning when working in groups. *Educational Research*, *3*, 331-345.

An empirically grounded tentative theoretical model (Figure 1), based on the result from the study has been developed. The purpose of the model is to clarify and systematize the components of group work teachers considered as relevant and important to assess.. The model distinguishes between assessments at the individual and group *levels*, i.e. if the tools of assessment were implemented at an individual or group level. The model reveals that the teachers universally assessed the students' results of the group work, here referred to as the *product.* The model also discloses that teachers assessed students' cooperation, in the model referred to as the *process. Who* conducted the assessments and how the assessment was comprised, i.e., *assessment strategies*, is also represented in the model. This model is presented in Figure 1.

	Group level		Individual level	
Product	**Contents** **-** contents of fact - criticism of the sources **Final product** **-** 'as a whole' **-** handle assignments **Presentation** **-** content **-** performance - teaching aspect		**Contents** **Final product** **-** responsibility taking **Presentation** - individual contribution	
Process	**Cooperation** **-** 'everything' - problem solving - split up or not **Activity** **-** job output - keep to the issue - knowledge development **Communication** **-** discuss - argue		**Cooperation** - job allocation **-** 'do one's bit/pull one's weight' - do one's best **Activity** **-** contribution - activity level - incentive - responsibility taking **Communication** **-** talk **-** listen - give and take instruction - courage to present	
Who assess	**The teacher**	**Students**	**The teacher**	**Students**
Assessment strategy - Ways to collect assessment information	- observation - matrix	-self assessment - peer assessment	- test after group work	- self assessment -peer assessment
Assessment strategy - Ways to submit assessment information		Log-book Communicate Perform		Log-book Communicate Perform

Figure 1. *Aspects considered when assessing in group work*

PRODUCT – WHAT THE TEACHERS ASSESSED

As mentioned earlier, the product is a result of students' work while the process is associated with the cooperation between students when they are working in common on a task. In relation to the product, the teachers mentioned that they assessed contents at a group level, but the final product and the presentation at both group and individual levels. Contents are, in addition to 'contents of fact', also criticism of the sources (see Figure 1). The following example from the empirical data will illustrate this. The class is divided into a number of small groups working on different energy sources. Each group has received instruction about acquiring facts and analysing the advantages and disadvantages as well as core components of the energy sources they are working with. To assist the group, the teacher has prepared a number of guiding questions to help the groups to structure the work. Each group is expected to produce an explanatory text, produced in common and follow up with a verbal presentation of their work to the class with a synopsis presented on Power Point. The assessments are carried out on the groups' work produced in common, that is, (a) contents (b) the final product and (c) the presentation. In considering group achievements, teachers reported that they assessed a group's contents of fact and which sources the group has used. They also assessed the overall product and the ability of a group to respond to the task's instructions correctly. The teachers undertake this by checking that all the task components are present in the final product and ensuring that the quality of each part is acceptable. The assessment is also geared towards evaluating the quality of a group's presentation supported by the Power Point; attention is focussed on (a) content as revealed in the verbal presentation and content in the Power Point, (b) a group's performance when reporting the outcomes of their group work, and (c) the suitability of the presentation for the classmates to learn from it. At an individual level, teachers explained that they assessed not only how much each student assumed responsibility but also, each student's individual contributions, by reviewing what and how much each student contributed in the task undertaken in common (see Figure 1).

PROCESS – WHAT THE TEACHERS ASSESSED

The process, i.e. the approach and interaction among students in group work, which teachers call "the way students work with the task," consists of (a) cooperation, (b) activity and (c) communication. Cooperation includes students' interactions, which the teachers express as 'everything' and identification of each student's individual contribution, to be able to assess both the group's cooperation, but also to be able to assess each student's contribution and what impact the contribution has on the group's ability to cooperate. In the study (Forslund Frykedal & Hammar Chiriac, 2010, 2011), the teachers predominantly considered two aspects of cooperation – the students' ability to cooperate (group level) and each student's contribution with 'their part' and 'done their best' (individual level). Student activity and ability to 'keep to the issue' instead of becoming distracted by various social activities or engaging in various off-task behaviours were other issues around students' cooperation that teachers assessed at a group level (see figure 1). At the individual level, teachers also assessed each student's ability to assume responsibility for the group's common work and the ability to have the initiative to encourage their peers to share responsibility. The quality of communication in a group was also an essential part of the process that teachers assessed at both a group and individual level. Students' abilities to discuss and argue constructively were abilities highlighted at the group level. Students' active contributions, sharing perspectives, active listening, giving and taking instruction and presentations skills were important abilities that teachers assessed at an individual level (see Figure 1).

The results from Forslund Frykedal and Hammar Chiriac (2010, 2011) reveal that what teachers assessed at the group and individual level, were influenced by their considerations that group work is a teaching method that primarily is most appropriately used to train and develop students' abilities to cooperate rather than to learn subject knowledge. These considerations also impacted on what was assessed and how assessment strategies were employed. Assessment of subject knowledge at the group level on the group's joint product on the group was only carried out through a test of the individual student's subject knowledge. Other assessments were carried out on a number of cooperative abilities (see Figure 1).

HOW THE ASSESSMENT WAS CARRIED OUT

Assessment strategies implemented by the teachers in general involved gathering (e.g., through observations) and receiving submitted assessment items at both group and individual levels. Teachers as "silent" observers (outside the group) collected assessment information through observations and recorded on matrices during the group work and by summative testing after the group work was completed. Assessment information was gathered from inside the group, by the students through self- and peer assessment during or after the group work was completed. The observations and matrices used by the teachers for assessment purpose were of a general nature and did not delineate what needed to be assessed. Conducting a test after the group work was unusual but was applied a few times each semester. The assessments of the students' final presentation and their performance of the group work in front of their classmates were almost always assessed through observations by the teachers.

According to the teachers in the study, the student's also had the opportunity to carry out self- and peer assessment at both a group and individual level. Assessments from inside the group, carried out by the students, were used to support and complement the assessment conducted by the teachers from outside of a group. Self-assessment also contributed, according to the teachers, to train and develop students' metacognitive abilities regarding cooperation, i.e. reflection on 'group work abilities'. When the students used self-assessment, they ordinarily (a) assessed their own contribution to the group work, (b) assessed their own role in the group, and (c) made suggestions on what needed to be developed further. Both group and individual level types of assessment were carried out. According to the teachers, they encouraged the students' use of self-assessment regularly in connection with group presentations and after the end of a group work activity or module. Self- and peer assessments were also implemented by the use log-books. The students, who wrote the log-book did so regularly and in addition to the individual self-assessment, they also performed peer-assessment on classmates' efforts and their contribution in fulfilling their respective roles. A problem mentioned by the teachers was that when using peer assessment, the students had difficulties separating assessment of the peers as a person and assessment of their knowledge and abilities. To overcome this problem, teachers trained students to

calibrate the self-assessment in relation to the assessment criteria e.g. what precisely was being assessed.

In summary the study elucidates that what was being assessed at a group and individual level in group work was frequently unclear; that assessment strategies were mostly informal and that the assessments were carried out by both teachers and students.

CONCLUSION

In the presented study the teachers provided vague descriptions when reporting the purpose of the assessment and what they assessed in the group work. For the most part, they employed informal assessment strategies with little regard however to providing feedback to their students.. Consequently, the assessment became amorphous, lacking in clarity for both the teachers and the students. Part of the reason for the lack of precision in implementation resided in the teachers' beliefs that group work, above all, was useful for training and developing student cooperative abilities but was irrelevant in fostering the growth of student knowledge. To implement an assessment, which gives teachers useful tools as the sources for instructions, and to help students develop their abilities in the group work, it is essential to construct a clear structure encapsulating the different facets of assessment to demonstrate how various types of data can be obtained but also to act as a platform for communicating this data, both orally and in written form to the students. When teachers aim to assess the knowledge and abilities of students engaged in group work, they need to be cognizant of and have clarity relating to (a) the purpose of the assessment, (b) what is going to be assessed, (c) how the assessment will be implemented and (d) who is going to carry out the assessment. Additionally, (e) they need to distil how to give feedback to the students. These aspects should be planned simultaneously with the creation of the task. Other important considerations, in the planning process, are to have a clearly defined purpose for the group work and the assessment as well, ensuring the assessment strategies are made transparent for the students.

PEDAGOGICAL IMPLICATIONS

Based on the results from the study presented in this chapter and relevant previous research we want to propose some pedagogical implication that could be useful for

teacher practice. The pedagogical implications concern (a) employing students as resources, (b) the creation of structures, and (c) the establishment of prerequisites for cooperation. A brief summary amplifying these points is provided below.

Students as resources

It is invaluable for both the teacher and the students alike for the teacher to include students in planning the task and the assessment in evaluating the effectiveness of the group work being undertaken. From the starting point of a collaborative perspective, it is essential that teachers should enlist the students in proposing and discussing what is to be assessed, which assessment strategies might be used and the students' role in the assessment process. Thus, students can be an asset in the implementation of the assessment. If students are given the opportunity to feel involved, be able to influence the foci for assessment and, help determine which assessment strategies might be used, such an inclusionary approach can provide opportunities for enhanced understanding of the assessment as well as an increased motivation for being involved in the group work. If students participate in self- and peer assessment it may also help them develop metacognitive thinking, which in turn can be nurtured thus allowing great devolution of responsibility to students over the long haul.

Create structure

A degree of structural prescription can be assistive to both teachers and students alike. The structure needs to incorporate: (a) learning objectives for the group work, (b) an articulation of what should be assessed, (c) which assessment strategies will be used and, (d) who is going to implement the assessment. A well-defined structure can support and provide opportunities for teachers to use group work as a pedagogical method, in which case both the development and assessment of students' cooperative skills and subject knowledge is possible. The structure also needs to include the timing of the assessment so it is therefore important to consider *when* the assessment should be implemented during the work to maximize the teaching and learning benefits for students. If the purpose is to conduct a formative assessment during the task, students need to be provided opportunities to receive constructive feed-back on (a) where they are in their learning process, (b) where they are going next and (c) how they will get there. Perhaps, however the intention might be to perform a summative assessment as means for a grade. Consequently, a teacher needs to consider this and plan ahead to be

able to create a clearly defined assessment structure, so that the group work assessment is transparent for the students.

Cooperation

According to Harrison and Howard (2012), cooperation and finely-honed, sensitive, responsive communication contribute markedly to high quality learning environments, i.e. establish prerequisites for cooperation among students, teachers, as well as between students and teachers. Accordingly, these being good arguments for the teachers to support the construction of well-developed group works, which in turn helps the students' to develop their knowledge and abilities. Accordingly, this is a sound argument for teachers and students to meet and together plan together not only the group task but also different components of the assessment and their relationship to the group work. Finally, teachers working collaboratively need to meet regularly to access one another's perspectives, sharing knowledge; jointly developing interesting, cooperative approaches to assessment is also important to creating congruency between teachers long-term goals for greater student self-regulation and the integrity of a current task or work module.

SUMMARY

- Start by creating clear learning objectives for the group work
- Establish a structure for (a) the purpose of the assessment, (b) what is assessed, (c) how the assessment is carried out, (d) the focus level, i.e. individual or/and group (e) who is assessing and (f)) how the feedback is to be implemented.
- Communicate the different parts of the assessment strategies to the students thereby promoting a transparent assessment structure.
- Involve the students' in the planning and implementation of the assessment. i.e., include the students as co-assessors.
- Cooperate with colleagues in the planning, implementation and development of assessments strategies.
- Elucidate that teachers have vague ideas of what they assess in group work and they use informal assessment strategies

Furthermore a tentative theoretical model based on the result from the empirical study has been developed and present different aspects considered when assessing in group work. Elucidating that teachers;

- o are influenced by their considerations that group work will train and develop students abilities to cooperate and not their subject knowledge
- o use group work to develop students' cooperative abilities, and not to learn subject knowledge
- o assessments focus on contribution and responsibility taking as wells as the ability to listen to the group members and give them instruction
- o assess pupils' subject knowledge in relation to the learning objectives were sparsely occurring

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