An extract of codes used by student teachers to analyse video from their school practice.

Categories and codes in headlines extracted from the full codebook for analysis of interactions in science classrooms (Andersen, H. M., & Nielsen, B. L. (2013). Video-Based Analyses of Motivation and Interaction in Science Classrooms. *International Journal of Science Education, 35*(6), 906-928).

Category	Codes		Description of code
Students	Students' engagement	Substantial engagement	When students are "doing science": construction, representation and evaluation of knowledge claims and investigative methods, showing that students are involved with academic content and issue.
		Procedural display	When students are "doing school": when the talk is about rules and regulations, homework assignments, lengths of thesis etc.
		Off task	When students do not work with and/or talk about the task
	Students' communi-cation	Generating ideas	When a student introduces own ideas about science into discussion in class or in group-work. The science ideas don't have to be canonically right. Is not used when students directly refer to formulation in textbooks or other canonical material.
		Uptake of peers' ideas	When students incorporate words or directly refer to utterances from other students.
		Overruling peers	When students directly tell peers to shut up, or imply that what they say is not relevant directly or indirectly by not listening.
		Easy solutions and shortcuts	When students' talk or actions directly indicate that they are taking a short cut to complete the task quickly.
Teacher	Teacher's questions and responses	Closed questions	A question with one correct answer. A question where the teacher already knows the answer and asks to hear if the student knows the answer.
		Authentic questions	A question that can be answered in various ways. A question not asked to elicit one single pre-specified answer but includes a request for information. Open-ended questions with indeterminate answers are a sub-set of authentic but not all authentic questions have to be open-ended.
		Formative feedback	When students get feedback focusing on their further development and learning process.
		Teacher's uptake	Is used when teacher is incorporating a part of a student's previous answer in their subsequent question or answer.
Approach to subject matter	Content perspective	Everyday perspective	Problem raised in a everyday context
		Scientific perspective	Problem raised in a scientific context
	Communi-cative approach (Mortimer and Scott, 2003)	Authorita-tive interactive	The teacher leads students through a sequence of questions and answers with the aim of reaching one specific point of view.
		Authorita-tive – non interactive	The teacher presents one specific point of view
		Dialogic - interactive	The teacher and students explore ideas, generate new meanings, pose genuine questions, listen to and include different perspectives.
		Dialogic - non interactive	The teacher considers various points of view, presents and explores different perspectives.