Intervention of Ali Nesin from the initiative Matematik Köy at Şirince at the "The Solidarity Economy in Turkey: First Meetings between Actors and Researchers" webinar

## English Translation of the "Matematik Köy" Podcast

## Introduction of Selin

I think one of the critical points of education is mathematics education, it has a specificity. Averages have very low number of correct answers. At every stage: entrance to high school, entrance to university. In addition, methodological, it is also a very controversial subject. How much can we make children love mathematics? How can we unleash their creativity? How far can we convey abstract thinking as a basic science? These are things that have been discussed since I was a student. I think the Mathematics Village was founded in response to this need. The professor Ali will explain in more detail soon. Therefore, in the general education title, we will talk about the mathematics village as a sub-section of the problematic education title. Sorry for the technical glitches. Please, you have 10 minutes. Then we will enrich it with question and answer.

## Matematik Köyü

Contrary to what you said, we did not set it up for that purpose. In one sense for that purpose may be, in another sense not for that purpose. Our primary objective was to train research mathematicians. To present the necessary material to the young people, not necessarily successful but interested young people, to consolidate their mathematical background. The background is practically non-existent, may be with a few exceptions. To teach them mathematics oriented towards research, reflection, questioning, to give them the right definitions and to make them more active...

I usually want them to be active in my lectures in the village. I sometimes videotape my lessons. Sometimes I stop so that the pupils can think alone by themselves. Recently, I saw that I had videotaped a 40-hour lesson for only 20 hours. So I have spoken for 50%. Which is actually too much. Normally I don't talk that much. If it's not videotaped, I talk less. In my two-hour lectures, I usually talk for 10 or 15 minutes at the beginning. I present the problem and give them time. I give them a lot of time, 2 hours. At the end I talk for another 10 or 15 minutes.

And the children love it. I ask them, "Did you like the lesson?". They answer "yes, we liked it". I say, "What did you like? They say they liked the lesson. I didn't lecture, you did the class yourself. Unfortunately, there is such a thing in Turkey. Students are very passive in classes. We try to make them active in the village. Secondly, children are very focused on success in school. They are looking for answers. Whatever the means are, reaching to the answer is important to them.

One day something interesting happened to me. As always, I asked a question and I give them time. The teacher started to answer. He started to say something. He knew it beforehand because it's not possible that he finds the answer all of a sudden. So I stopped

him. After that moment, the children stopped thinking. "What was the teacher trying to say?" Just what the teacher said, let's take a clue from there so we can reach the answer... It was very interesting for me. Of course, it takes time for the student to get into the problem and start thinking about it. This usually takes 10 to 15 minutes. I call it biting the bait. I see that they are really working hard. Another observation I have is that they get pushed aside because they are very answer-oriented. I tell them: don't look for the answer, go after the truth.

They chase the answers because success is very important. Failure causes a disaster in our education system. It can have disastrous consequences. It affects the whole future. Therefore, students are naturally oriented towards success. Which, of course, leads to failure. Because you don't venture into the dangerous areas when you can. You avoid them. There is such a problem. Of course, the biggest problem is teachers. There are two big problems in Turkey. The first is the system. The second is teachers. The teachers are very poorly qualified. And also they don't make any effort to improve themselves. No matter how bad the system is, the students get somewhere in the hands of good teachers.

Unfortunately, this is not the case in Turkey. Because they get a bad degree and there is no reason to improve afterwards. The more knowledgeable, more sophisticated, more literate, more researcher teacher does not have a higher status, salary or respect. And the teacher is not free. Because of the system. In the village, our teachers are free, they have to teach at certain specific times, but apart from that they can teach wherever they want, whatever subject they want and however they want. Of course, we propose a programme in advance to the students, but the lecture depends on the teacher's will.

And he can give his lecture as he likes, as long as it is at certain times. Freedom always leads people to be more productive, more creative and more efficient. Freedom is very important. In Turkey, teachers are not free at all. In fact, I think they are at the bottom of the command system. They are all under the control of a head of department, a director, a district director of national education, a provincial director of education, inspectors, the ministry, the curriculum, etc. And now in private schools, they are under the control of the parents and students. It is not fair to expect efficiency from someone who is under so much pressure. In the meantime, let me tell you this; public schools are much better than I expected, much better than private schools.

In terms of student behaviour, in terms of teacher-student relationships, in terms of relationships between them, in terms of interest, I am very happy with the public schools. I had no idea, I was very surprised. I had a prejudice. The public schools, especially those in the countryside, are very good. In other words, Turkey is a developping country, they also suffer the consequences of this backwardness. But when you look at Turkey in general, when you compare with public schools, the public schools in the provincial centres are quite good. I mean, we were not so civilised when we were children, when we were young. Their relationship is very civilised, I like it very much.