Bedouin Tribe Has Record Rate of Deafness

By Nancy Cayton, ASL Department Staff. This article originally appeared in the spring 2007 ASL News newsletter.

In the unrecognized village of the Al-Sayed* tribe in the northern Negev (near Hura) in Israel deafness is not usual. The Bedouin tribe has about 3,000 people with more than 150 who were born deaf, about 5%. The overall world average is reported to be 0.1%, making this village’s rate 50 times the world average.

The rate of deafness is unusually high because, according to genetic tests, an estimated one fourth of the community carry the recessive trait. Deafness can occur only when both parents have the trait. If both parents have the trait, then there is a 25% chance that their children will be deaf. In this population, however, 65% of marriages are consanguineous, meaning that the couple are related to some degree, and that greatly increases the chance. In fact, 27% of the marriages are between cousins.

The genetic testing team visiting the village found 16 genes related to deafness among members of the Al-Sayed tribe.

The team provided genetic mapping for everyone. Genetic counselors can use the map to determine what chance perspective parents have of having deaf children. The tribe members have not shown interest in this information.

“Many of the members of the tribe, mainly the older people, believe that there is no connection between the deafness in the tribe and genetics. They say it is from God,” says Dr. Abed al-Sayed, a dentist who is married to a member of the tribe and the main intermediary between them and the researchers as noted in the article “One in Twenty,” published in Deaf Today in 2004.

He continues, “They simply don’t see deafness as an illness. We’ve been experiencing deafness for hundreds of years; today in the village they look upon a deaf person as an ordinary person—he simply doesn’t hear. A deaf person isn’t considered ill. Because there are so many deaf people, they aren’t exceptional any more; everyone has one or two deaf children in the family. The hardship becomes easier, nobody is alone. In every third house there is someone deaf. There are deaf elderly people, there are deaf parents and there are deaf children.”

Like the now extinct 19th century signing community on Martha’s Vineyard island in the United States, people marry others in the village due to isolation. On Martha’s Vineyard, the isolation was physical, due to limited transportation between the villages and also with the mainland in those times. The Al-Sayed tribe is socially isolated.

According to oral histories, the tribe leader and his wife came to the Be’er Sheva region from Egypt 150 years ago. He settled with Bedouin tribes in the area and raised crops and livestock. By the time his children were grown, however, these tribes refused to allow their daughters to marry into the Al-Sayed tribe because it was not considered “original Bedouin.” Original Bedouin were considered to be from Saudi Arabia. These groups view tribes who came later from Egypt, like the Al-Sayed, as second class. Even today, other Bedouin tribes will not allow intertribal marriages with members of the Al-Sayed tribe.

Two of the leader’s five sons were deaf and all of the 150 deaf people in this community are their descendents.

Members of the Al-Sayed tribe were rarely successful in finding spouses from other tribes and so have almost exclusively married among themselves for three generations. During this time there were more women than men. According to Bedouin tradition, a woman is not permitted to remain single, thus many men were required to marry more than one woman, helping the trait for deafness to be passed on more quickly and easily.

*Spelling of the tribe’s name also appears in literature as Al-Sayyid.
Finding adequate educational facilities for their deaf children has been difficult for the families of the Al-Sayed tribe. Locally, the Niv school in Be’er Sheva, which specializes in working with deaf Bedouin children, accepts fewer and fewer children each year. In the past the school enrolled about 600 students. Currently it has only 49. Children who are not at the Niv school go to one of the hearing Bedouin schools, where there are typically no staff that know how to work with deaf children. It is common for the schools to place deaf children in classes with severely developmentally delayed or autistic children.

The Niv school, like other schools in Israel that deaf children might attend, use Hebrew as the written language or for speech therapy. Most commonly, however, the Bedouin families use Arabic at home. Some Bedouin families know Hebrew, but not necessarily. Finding a speech therapist that uses Arabic is not an easy chore. Israel has approximately 1,562 certified therapists but only 34 speak Arabic. None of the 34 work in the region where the Al-Sayed children are. Additionally, outside of Niv, all the schools for deaf children use Israeli Sign Language, but the children from Al-Sayed have their own language.

The people of the Al-Sayed tribe have been studied not only by geneticists but also by linguists. As it turns out, the sign language used by both deaf and hearing people in that tribe is specific to them and has arisen in the last 70 years, over the last three generations. The researchers have called the language Al-Sayed Bedouin Sign Language (ABSL).

ABSL is not simply a variation of local sign languages. Singers who use Israeli Sign Language cannot understand ABSL and ABSL users cannot understand Jordanian Sign Language, which is shown when interpreting is available for Jordanian television programs that are received in the area. Data collected by the researchers also show that ABSL is unrelated to either spoken Israeli or the local Arabic dialect.

Much to the surprise of researchers, Al-Sayed Sign Language users can use the language to discuss wide-ranging, complex, and abstract topics, as well as discussing things that are in the past or future, not just the present.

As in the old Martha’s Vineyard communities, deaf people are fully integrated into the village society and a significant number of hearing people can communicate in sign. Because deaf people are distributed throughout the community, hearing people tend to have daily contact with them and, therefore, signing is not restricted to only deaf people. Additionally, each new generation has the opportunity to learn the language from competent adult models.

It was a unique opportunity to study a language that has developed inside a stable community without known external influences. Linguists focused on the second generation of signers, but hope to do additional studies that include the third and successive generations. What they have found from studying the second generation is that one of the most important organizing principles in a language, the grammatical relation between subject, object, and verb, becomes fixed at a very early stage in the development of the language.

A number of other “new languages” have been studied over the years, including pidgins, creoles, and the recently created sign language in Nicaragua. These languages, however, have developed under unusual social and linguistic conditions that do not characterize the use, acquisition, and transmission of language in a typical human society. Creoles, for example, form when people of different cultures and languages come into contact with each other. The sign language in Nicaragua is transmitted by one group of students to the next and did not grow through family or community outside the school. These differences may have an effect on their

continued on page 3
linguistic structure.

**Resources used to write “Bedouin Tribe Has Record Rate of Deafness”**


