Sickle cell anemia and influenza
What should we be concerned about?

Sickle cell anemia is an important congenital hematological disorder caused by a defect of the globin chain of the hemoglobin molecule. The disease is prevalent in tropical Africa and to a lesser extent in the American black population, in the Middle East and in Greece, and is seen sporadically in Caucasians of many other areas. At present, many Africans living in Africa and other parts of the world have the disease or are carriers of this genetic defect. Influenza infection may occur among the sickle cell anemia population, and this is an interesting topic. There is no doubt that influenza virus infection in patients with sickle cell anemia is associated with special problems, and this specific topic is discussed here.

Firstly, the classical clinical manifestations of influenza can be seen in patients with sickle cell anemia. The combination of high fever, malaise, runny nose, sneezing and cough is the classical clinical presentation. However, severe manifestations can be observed, of which pneumonitis and acute myositis are specific examples. These complications lead to a poorer outcome of influenza, with higher mortality among the sickle cell disease patients with influenza. Patients with sickle cell anemia have a high risk of developing severe infection if they get infected. Impaired IgM antibody response to an influenza virus infection in adults with sickle cell anemia has been reported. Routine vaccinations recommended for individuals with sickle cell anemia include influenza vaccine. An annual influenza vaccination after six months of age is recommended.

At present, the emerging epidemic of swine flu is of concern. Several cases of swine flu have been reported from around the world in the present pandemic scenario. Of special concern are patients with sickle cell anemia who might become infected. To date there has been no report on the course of swine flu in individuals with sickle cell anemia, but this is a topic worthy of special attention.

V. Wiwanitkit
Wiwanitkit House, Bangkhae, Bangkok, Thailand

References

Corresponding author:
V. Wiwanitkit, Wiwanitkit House, Bangkhae, Bangkok 10160, Thailand
e-mail: wviroj@yahoo.com