



## An Overview on Leprosy: Its Global Efforts and Challenges

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### DESCRIPTION

Leprosy, also known as Hansen's disease, has been a condition deeply entrenched in human history, bearing a complex tapestry of social, medical, and cultural dimensions. This chronic infectious disease primarily affects the skin, peripheral nerves, mucosa of the upper respiratory tract, and eyes, often causing disfigurement and disabilities if left untreated. Despite being ancient, leprosy continues to persist in various parts of the world, posing challenges in terms of diagnosis, treatment, and societal stigmatization.

Leprosy's historical significance is profound, as it has been documented since antiquity. Records of the disease date back to ancient civilizations such as China, Egypt, and India. Throughout history, those affected by leprosy faced social ostracization and were often segregated from mainstream society. In the middle Ages, this segregation led to the establishment of leprosariums or leper colonies, further perpetuating the social stigma associated with the disease.

*Mycobacterium leprae*, the bacterium responsible for leprosy, primarily affects the skin and peripheral nerves. The transmission of the disease occurs through respiratory droplets, but it's important to note that leprosy is not highly contagious. Prolonged close contact with an untreated individual is typically required for transmission to occur. Factors like malnutrition and genetic susceptibility also play a role in determining an individual's susceptibility to the disease.

Leprosy manifests in various forms, classified mainly into two types: tuberculoid and lepromatous. The tuberculoid form is characterized by limited skin lesions and nerve damage, while the lepromatous form exhibits widespread skin nodules and significant nerve involvement. The disease's progression can result in nerve damage, leading to sensory loss, muscle weakness, and paralysis in severe cases.

Diagnosing leprosy involves clinical examination and, in some cases, skin biopsies or molecular testing to confirm the presence of *M. leprae*. Multidrug Therapy (MDT) has been a pivotal

treatment strategy endorsed by the World Health Organization (WHO) to effectively manage leprosy. This treatment involves a combination of antibiotics like dapsone, rifampicin, and clofazimine, which can cure the disease and prevent further transmission.

Beyond its medical aspects, leprosy's impact extends deeply into socioeconomic realms. Stigmatization and discrimination against individuals affected by leprosy persist in various cultures, leading to social exclusion, loss of employment opportunities, and psychological distress. Efforts to eliminate this disease require not only medical intervention but also social and cultural transformations to eradicate the associated stigma.

The global health community has made substantial strides in controlling leprosy. Initiatives like the Global Leprosy Strategy 2016-2020 aimed to accelerate efforts to stop leprosy transmission and prevent disabilities among affected individuals. However, challenges persist, including limited access to healthcare in certain regions, delayed diagnosis, and the need for continued surveillance and monitoring of the disease.

Addressing the stigma attached to leprosy demands comprehensive societal changes. Education campaigns and advocacy for human rights are crucial to dispelling myths and misconceptions surrounding the disease. Empowering affected individuals by integrating them back into their communities without discrimination is pivotal for their social and psychological well-being.

Leprosy's journey through human history has been tumultuous, marked by fear, social segregation, and medical advancements. While significant progress has been made in controlling the disease, challenges in terms of stigma, access to healthcare, and eradication efforts remain. A multidimensional approach involving medical interventions, social reforms, and global solidarity is essential to eliminate both the disease and the stigma associated with it, ensuring a world where individuals affected by leprosy are treated with dignity, compassion, and inclusion.

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