Lumbar degenerative spondylolisthesis (LDS) is an acquired slippage of one lumbar vertebra over the lower one because of degenerative instability, in the absence of a defect in the pars interarticularis. The disease is frequently seen observed in middle-aged and older aged females, and patients with or without may have no clinical symptoms.

Most of the time, the symptomatic patients respond well to non-surgical treatments, such as which include lifestyle modification (reducing environmental pain generators), medication, physical therapy, weight reduction, multidisciplinary pain clinics management, or epidural injections.

In refractory cases, patients with intolerable symptoms (a dramatic decline in quality of life, unresponsive to a reasonable trial of >3 months conservative treatment, rest pain, progressive neurological deficit, or sphincter disturbances) or patients who are nonresponsive to a reasonable trial of >3 months of conservative treatment, surgery may be necessary. At the present time, 70-80% of the surgically treated patients have a report satisfactory outcomes, but due to because of the continuing degeneration process, the results outcomes get worse over time. Common poor prognostic factors commonly quoted for the patients undergoing surgical treatments include age >65 years, chronicity of symptoms >24 months, instrumentation >4 levels, inability to restore sagittal balance, comorbidities >4, more preoperative back pain more than leg pain, posterolateral versus 360° fusion versus 360 degrees, intermittent claudication after walking for more than several hundred meters, previous surgery, and inability to fuse. A range of many surgical techniques have been used for surgical treatment of LDS. These include, e.g., indirect reduction alone, decompression alone, decompression plus lumbar fusion with or without instrumentation, and decompression and slip reduction plus instrumented fusion. In this study, we aimed to
evaluate the surgical outcomes of degenerative spondylolisthesis LDS with neural decompression, pedicular screw fixation, and posterolateral fusion.

Comment [Editor4]: Abbreviations are usually spelled out once at their first mention in the text, and the abbreviated form is used consistently thereafter. As LDS has already been defined above as “lumbar degenerative spondylolisthesis,” only the abbreviation has been used at this instance.