laboratory - Laboratory findings include hemoconcentration, - a syndrome of sudden-onset noncardiovascular pulmonary edema general hypoalbuminemia, and neutropenia or neutrophilia. findings occurring during or a few hours after transfusion of a blood product - Early diagnosis is important to prevent administration of - The incidence is 1 to 5 in 10,000 transfusions, and it usually diuretics that may be detrimental in TRALI. occurs after administration of products containing large amounts of plasma, although it has been reported to occur after administration - Treatment includes oxygen administration and sometimes epidemiology treatment mechanical ventilation (required in approximately 68% of cases). of as little as 50 mL of whole blood or any plasma containing blood - Corticosteroids have been advocated by some authors, although products including intravenous immunoglobulins. their use has never been examined in a controlled prospective study. - The pathogenesis is unknown; however, it has been suggested that **TRALI** - The clinical course in TRALI is often benign, with improvement starting leukocyte activation due to antibodies in donor plasma to antigens of after 24 to 48 hours; if the patient survives, no sequela are observed. recipient white blood cells or reactive lipids in aged cellular blood prognosis components are important contributing factors. However, mortality remains high, at about 5%, and TRALI is the third cause of transfusion-related mortality. - Although host factors such as infection, cytokine administration, lung pathogenesis disease, and recent surgery may contribute to the incidence and severity of TRALI, the syndrome was also reported in healthy volunteers receiving - Prevention is the most important measure including avoiding unnecessary blood products. transfusions, increased use of red cells containing less plasma, and possibly - Activated leukocytes are sequestered in the lungs and cause damage to avoiding the use of products containing large amounts of plasma derived from prevention the capillary-alveolar membrane leading to congestion, hypoxia, pulmonary multiparous women, who often are autoimmunized against leukocyte antigens edema, hypovolemia, hypotension, and fever. during pregnancy.