

Learn2Invest: An Intelligent FA–TA Based Stock Market Education and Paper Trading System

Abstract

The growing participation of retail investors in financial markets has intensified the need for accessible and practical stock market education systems. While numerous platforms offer either theoretical instruction or standalone trading tools, beginners often struggle to understand how investment decisions are formulated and evaluated in real-world scenarios. This disconnect between conceptual learning and practical application results in limited decision-making confidence and increased risk exposure.

This work presents *Stock Learn*, an integrated stock market education and paper trading platform designed to bridge the gap between theory and practice. The platform focuses on combining Fundamental Analysis (FA) and Technical Analysis (TA) within a unified learning ecosystem. Structured educational modules introduce core investment concepts, including financial statement analysis, valuation metrics, price trends, and technical indicators. These learning components are directly linked to an interactive paper trading environment that enables users to execute simulated trades using virtual capital in a risk-free setting.

The proposed methodology integrates analytical models that generate insights based on FA metrics (such as earnings, revenue growth, and valuation ratios) and TA indicators (including moving averages and trend signals). A feedback mechanism compares system-generated insights with user decisions and subsequent simulated outcomes, providing guided evaluation and performance tracking. This iterative learning loop enhances conceptual clarity and reinforces practical understanding.

The results suggest that integrating educational content, analytical insights, and simulated trading within a single platform significantly improves experiential learning and decision-making confidence. By offering a structured, risk-free, and feedback-driven environment, *Stock Learn* demonstrates the potential of technology-enabled financial education systems to empower beginner investors and promote informed participation in financial markets.

Keywords: Stock Market Education, Fundamental Analysis, Technical Analysis, Paper Trading, Financial Technology, Investment Learning, Decision Support Systems, Experiential Learning.

