

## THE GLOBAL DERIVATIVES MARKET

The derivatives market has recently attracted more attention against the backdrop of the financial crisis, fraud cases and the near failure of some market participants. In this regard, the study of trends in the development of this market is quite relevant. The main aim of this paper is to describe the current state of the world market of derivatives, identify trends in its development.

В последнее время рынок деривативов привлекает все больше внимания на фоне финансового кризиса, случаев мошенничества и почти полного краха некоторых участников рынка. В этой связи изучение тенденций развития этого рынка представляется достаточно актуальным. Основная цель статьи – описать современное состояние мирового рынка деривативов, выявить тенденции его развития.

*Key words:* derivatives; the world market of derivatives.

*Ключевые слова:* деривативы; мировой рынок деривативов.

The derivatives market is the financial market for derivatives, financial instruments like futures contracts or options, which are derived from other forms of assets.

In finance, a derivative is a contract that derives its value from the performance of an underlying entity. This underlying entity can be an asset, index, or interest rate, and is often simply called the “underlying”.

There are two types of derivatives: financial derivatives and commodity derivatives. The basic difference between these is the nature of the underlying instrument or asset. In a commodity derivative, the underlying instrument is a commodity which may be wheat, cotton, pepper, sugar, jute, turmeric, corn, soyabeans, crude oil, natural gas, gold, silver, copper and so on. In a financial derivative, the underlying instrument may be treasury bills, stocks, bonds, foreign exchange, stock index, gilt-edged securities, cost of living index, etc.

The most commonly used derivatives contracts are forwards, futures and options.

Forward contracts are binding agreements to buy or sell an asset at a specific price on a specific date.

A futures contract is simply a standardized forward agreement. Futures differ from forwards in that they are standardized and the parties meet through an open public exchange, while forwards are private agreements between two parties and their terms are therefore not public.

An option gives the holder the right – but not the obligation – to buy or sell an asset at a specific price on a specific date. A call option represents the right to buy, while a put option represents the right to sell. The major difference between an option and forwards or futures is that the option holder has no obligation to trade, whereas both futures and forwards are legally binding agreements.

Derivatives provide three important economic functions:

- Risk management. The primary purpose of risk management is to protect existing profits, not to create new profits.

- Price discovery. Derivatives are exceptionally well suited for the role of providing price information. They are the tools that assist everyone in the marketplace determine value. The wider the use of derivatives, the wider the distribution of price information. Derivatives are exceptionally well suited for the role of providing price information. They are the tools that assist everyone in the marketplace determine value. The wider the use of derivatives, the wider the distribution of price information.

- Transactional efficiency. Transactional efficiency is the product of liquidity. Inadequate liquidity results in high transaction costs. This impedes investments and deters the accumulation of capital. Derivatives facilitate the opposite result. They significantly increase market liquidity. As a result, transactional costs are lowered, the efficiency in doing business is increased, the cost of raising capital is lowered, and the amount of capital available for productive investment is expanded.

Originally derivatives were used to hedge risk on agricultural commodities. Since the 1970's there has been a surge in the growth of derivative markets.

Around 25 years ago, the derivatives market was small and domestic. Since then it has grown impressively – around 24 percent per year in the last decade.

Between 1983 and 2003 it is estimated that the global market for all derivative contracts exceeded US \$120 trillion [1].

Nowadays derivatives trading is worth \$600 trillion – six times more than the total economic output of the entire world. In fact, 92% of the world's 500 largest companies use them to lower risk [2]. The derivatives market is predominantly a professional wholesale market with banks, investment firms, insurance companies and corporation as its main participants.

Nearly 85% of all derivatives are traded between two companies or traders that know each other personally. These are called Over the Counter (OTC). They are also traded through an intermediary, usually a large bank.

The rest are traded on exchanges. These public exchanges set standardized contract terms. They specify the premiums or discounts to the contract price. This standardization improves the liquidity of derivatives. It makes them more or less exchangeable, thus making them more useful for hedging.

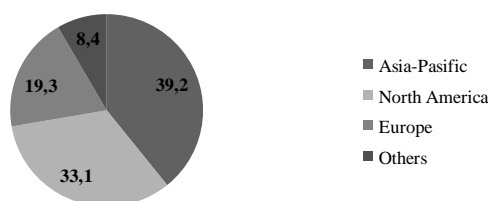
The Bank for International Settlements publishes information regarding the total outstanding value of Over the Counter and exchange-traded derivatives positions on a semi-annual basis.

2015 year's annual survey highlights that derivatives volumes grew strongly in 2015, up 12% on 2014. The Asia Pacific region was responsible for a large proportion of this growth (volumes were up 36% on the previous year). Another big theme in 2015 was a surge in the trading of commodity futures and options, which has grown more rapidly over the past several years than any other sector of the global listed derivatives markets.

At the global level, the total number of futures and options traded on exchanges worldwide rose to 24,78 billion contracts in 2015.

You can see the regional structure of futures and options traded on exchanges worldwide in 2015 on the picture [3].

**Regional structure of the worldwide options and futures exchange trading in 2015, %**



It is important to note that many of the fastest growing markets in Asia have relatively small contracts and draw much of their business from retail traders, whereas the leading exchanges in North America and Europe tend to have larger size contracts that are better suited to institutional investors, corporate hedgers and other wholesale market participants.

As for varieties of derivatives equity derivatives remain the most actively exchange traded derivative products though their contribution to overall volume traded has declined over time to just under 55% of the total traded in 2015, interest rate derivatives – 14%, currency derivatives – 11%, commodity derivatives – 18%, the «other derivatives» category comprises a wide range of products, including volatility index options, exotic options and futures, REIT derivatives, dividend and dividend index derivatives and CFDs – 2% [4].

Global OTC derivatives markets saw a broad-based decline in activity in the second half of 2015. The notional amount of outstanding contracts fell by 11% between end-June 2015 and end-December 2015, from \$552 trillion to \$493 trillion [5].

The interest rate segment accounts for the majority of OTC derivatives activity. At end-December 2015, the notional amount of outstanding interest rate derivatives contracts totalled \$384 trillion, which represented 78% of the global OTC derivatives market.

Foreign exchange derivatives make up the second largest segment of the global OTC derivatives market. At end-December 2015, the notional amount of outstanding foreign exchange derivatives contracts totalled \$70 trillion, which represented 14% of OTC derivatives activity.

The notional amount of outstanding credit default swap contracts fell from \$15 trillion at end-June 2015 to \$12 trillion at end-December 2015.

The notional amount of OTC derivatives linked to equities totalled \$7,1 trillion at end-December 2015, and the gross market value \$0,5 trillion [5].

What will future bring for derivatives markets?

Derivatives markets around the world are undergoing a radical transformation but their final shape – which will determine where and how derivatives are executed in the future – will largely be dictated by market participants' ability to trade on a cross-border basis. Demand for derivatives to hedge risk has risen, and isn't likely to fall anytime soon given liquidity, volatility and market and political risks in nearly all jurisdictions. As a result, it is imperative that derivatives remain accessible.

Nevertheless it is need to reform unregulated parts of the derivatives market. Regulators, supervisors and academics have identified deficiencies in the OTC derivatives market – particularly non-CCP-cleared and uncollateralized trading – that pose a threat to the stability of the financial system as a whole. Regulators should use the momentum that has built up over the course of significant bailouts and defaults of key players in the industry during the financial crisis to mobilize industry forces in an effort to increase safety and integrity in all areas of the derivatives market.

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