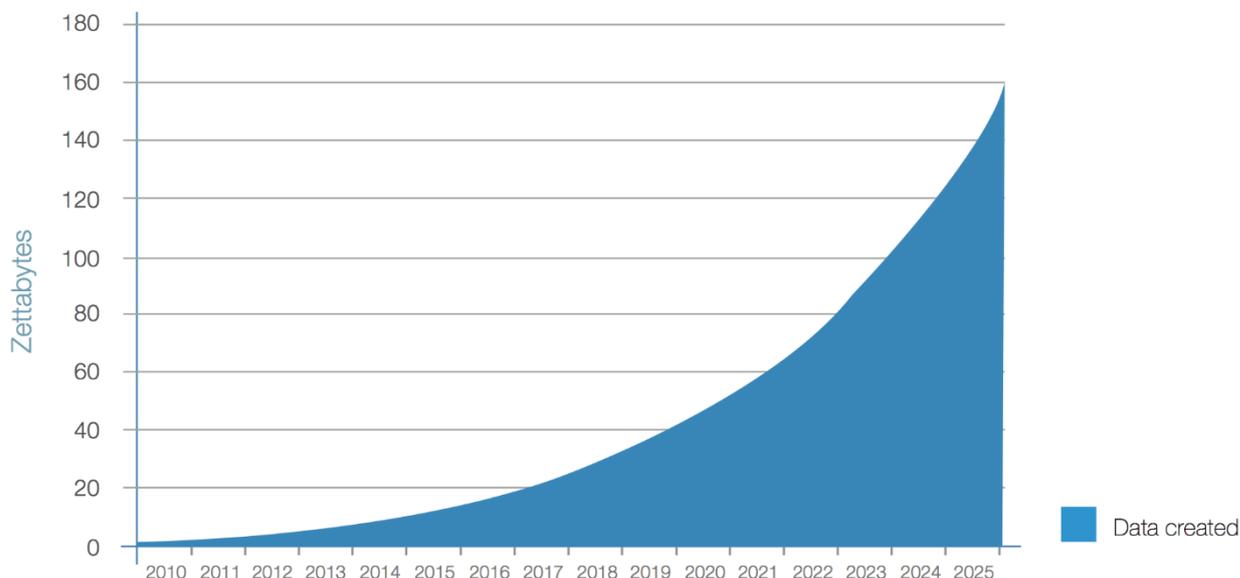


## POST PLATFORM – PRESERVING RIGHTS ON YOUR CONTENT

### 1. Introduction

Every day we produce a huge amount of content: photos, articles, audio, video etc. Everyone wants to publish his/her content on various Internet platforms (social networks, public media resources etc.). It's our mission to identify content owner and let others check this information for many practical purposes.

More than 2/3 of digital content in the entire Internet is consumed/created by consumers which do not have efficient and cheap instruments for copyright protection. There is a great need for simple, fast, independent, and decentralized system identifying and evaluating your intellectual property.



Source: IDC's Data Age 2025 study, sponsored by Seagate, April 2017

Our team has developed a project of Content Identification Platform (CIP). We created decentralized service using technology of a distributed ledger (Blockchain). For that purpose, we created our universal token called NEWS which will be used to run transactions in the CIP network.

The NEWS token is created on platform called Waves, and it is the official token of the NEWS1.ru service.

The NEWS token has its own asset ID: DQUrzGsXp84Z4aPXLEkhgApf8TpCQqtoY87gdwUTurL7

To run services using the NEWS token, we created a Certification Platform called "POST". This platform uses the best approaches and practices of copyright protection and makes use of the distributed ledger technology (Blockchain) in process of copyright owner identification.

Using the POST platform as the base, apart from Content Identification Platforms (CIT), we will develop a smart contract based system, where each economical agent will be able to sell, rent, and transfer objects of intellectual property.

## **2. How It Works**

From Content owners' point of view, the copyright protection on our platform looks just like a payment made in NEWS tokens. One can make a transaction using NEWS to pay out desired content from user's wallet both to the owner's wallet and to the verification server wallet.

At the moment of a transaction, a special program for web browsers and mobile gadgets calculates the hash of the content and sends it, together with the calculation date and the URL of the content, to the Blockchain storage. The hash is stored in Blockchain, unchangeable and undeletable.

After that, if there is any question about the rights of ownership, it is sufficient to compare the records of the hashes of the content in the Blockchain to determine the rights holder.

Payments for the content in NEWS tokens enable content creators to secure their rights to the content, to prove the uniqueness of the content, and to use it as a commodity for sale, lease, or transfer of the ownership.

## **3. The Investors Corner**

From investors' point of view, the NEWS token possesses the payment and investment attractiveness. Increasing volume of digital content will boost the number of transactions on the platform POST. This, hence, will lead to the systematic increase in the NEWS tokens turnover. Demand and price of the NEWS token have a strong basis for stable growth proportional to the content volume coming to our platform.

On the other hand, the exponential growth of the volume of digital content in the Internet creates demand for the fast and cheap transfer of the ownership of content. The NEWS token is a universal and handy tool for owners to sell, lease, and transfer digital content without significant financial and time costs.

The technology of the platform POST is fair and unchanged, it is based on records in the distributed ledger (Blockchain). This creates a huge incentive to use our platform for digital community.

The integration of the Web NEWS Market will also enhance the demand for NEWS tokens as means of payment. The NEWS Web Market makes the whole content registered on our platform available to all users of the Internet.

The economy of the NEWS token includes regular planned growth of its value as other services on our platform emerge. Therefore, it's very reasonable for all content owners to acquire NEWS tokens at early stage of our project to be able to pay off services and big amount of digital content in the future, when price of the NEWS will be much higher.

Total amount of tokens is and will always be constant and equals to 150 000 000 NEWS.

How to join and acquire NEWS tokens:

You can join our project right now and acquire any desired amount of the NEWS tokens for any sum you have. Take into account that:

- Any release of new services on our platform will create stimulus for many people and organizations all over the world to use the platform and, hence, this creates strong basis for the solid growth of the NEWS token value;
- Collaboration with news agencies, Internet portals, universities, libraries, bloggers and anyone who needs protection of their intellectual property will also create demand for NEWS tokens as well.

While the value of NEWS token may grow proportional to the volume of the registered content, ordinary users shouldn't worry about affordability of our services (an ability to record of content hash into Blockchain), since it will cost just hundredths of a NEWS token.

- You can pay out both services and content on our platform with NEWS tokens.

How to get NEWS tokens:

To get NEWS tokens you should register a Waves wallet at <https://waveswallet.io> or download Waves app for iOS, Android, or Google Chrome.

To buy tokens, enter Waves token exchange and select "NEWS" in the asset list, then choose a pair for exchange (for example NEWS/USD) to convert USD, EUR, Bitcoin, Litecoin, Ethereum, Waves, Zcash etc. to NEWS.



There is another way to get NEWS tokens. You can visit our ICO portal [ico.news1.ru](http://ico.news1.ru) that contains wallets of cryptocurrencies Bitcoin, Litecoin, Ethereum, Waves, Zcash to convert these cryptocurrencies to NEWS directly, without the Waves exchange.

#### 4. Technology

Our technology uses best approaches and practices of cryptography, taking into consideration needs of all content producers in the world. We understand that now it's hardly possible to protect your digital content, especially when you produce digital content with short term life cycle. We also believe that modern technology can change current status quo and open new horizons for the content monetization.

There are four main stages (layers) of the content identification and the content passport creation (see the picture below):

- 1) hashing content base elements for text and images (using minHash for text\* and Marr–Hildreth algorithm for images\*\*);
- 2) matching calculated hashes for Base Elements which are unique and doesn't match afore saved hashes in our DB; these hashes are saved in the DB;
- 3) generating a Content Passport (CP) using a Merkle tree (SHA256);
- 4) recording the CP into the Distributed Ledger.

\*O.Chum, J.Philbin, A.Zisserman. Near Duplicate Image Detection: min-Hash and tf-idf Weighting, BMVC 2008

\*\*Umbaugh, Scott E (2010). Digital image processing and analysis : human and computer vision applications with CVIPtools (2nd ed.). Boca Raton, FL: CRC Press. ISBN 978-1-4398-0205-2

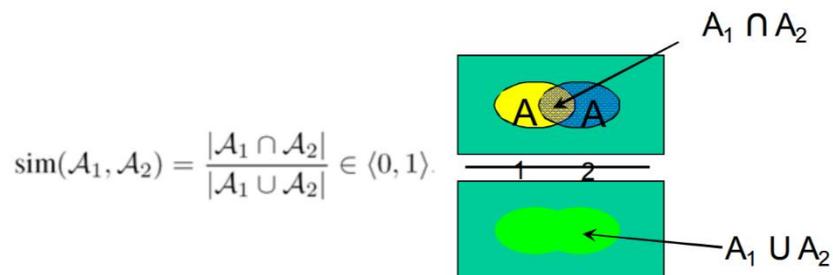
**NOTE:** only content with the CP can be monetized through the NEWS system.

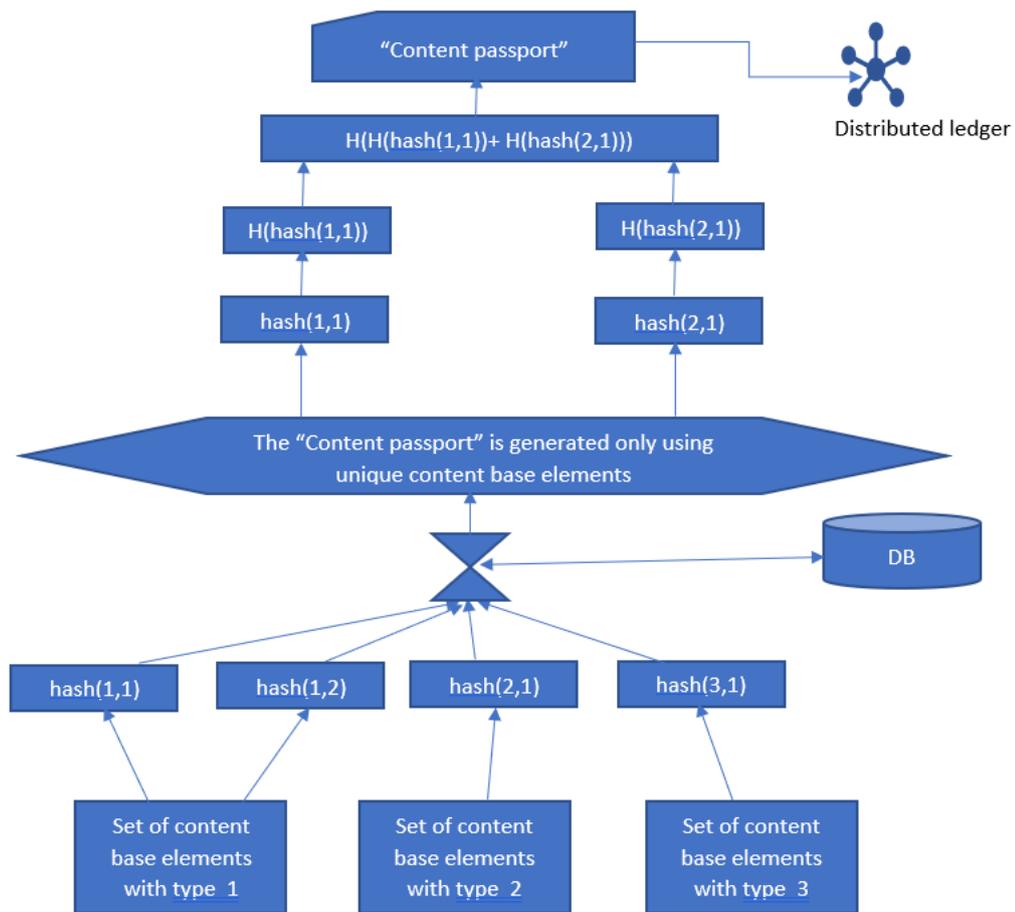
A few words about minHash. MinHash is a technique for quickly estimating how similar two sets are. It was invented by Andrei Broder. MinHash is also locally sensitive hash function (locality sensitive hashing, LSH), which selects elements  $m(A_1)$  from a dataset  $A_1$  and  $m(A_2)$  from a dataset  $A_2$  in such a way that the following condition is satisfied:

$$P\{m(A_1) = m(A_2)\} = \frac{|A_1 \cap A_2|}{|A_1 \cup A_2|}$$

This condition means that a similar set must have the intersected set of elements. This approach enables us to identify an element similar to a file formerly uploaded to our service. This hashing algorithm enables us to:

- certify content;
- work efficiently with big data;
- carry out quick search (linear to the number of duplicates).





The process of the content identification and calculation of the content passport

## 5. Prospective Services on the POST Platform using the NEWS token

### The Token Explorer

The Explorer lets users see, using wallet address, their balance and a list of their NEWS transactions. It's very easy to get access to the Explorer, you only need to input your wallet address on our ICO portal ICO.NEWS1.ru

### The Verification Center

The Verification Center implements functions of the content uploading.

### The Browsers addon

The Browser Addon is connected to your NEWS wallet and lets you certify and pay off selected content.

### The NEWS Web market

The NEWS Web market lets you acquire content for NEWS tokens. A range of services and revenue of NEWS tokens on this platform grow interconnectedly.

### Mobile apps

Applications for smartphones and tablets enable users to certify any produced and uploaded by users content (consisting of photos, text, and video).

## Coinmarketcap integration

Integration with “Coinmarketcap” platform will enable all users to see estimation of NEWS token capitalization and evaluation of its price.

Cryptocurrencies: **1369** / Markets: **7593** / Market Cap: **\$612 223 710 893** / 24h Vol: **\$44 226 431 566** / BTC Dominance: **49.8%**

## Cryptocurrency Market Capitalizations

Market Cap	Trade Volume	Trending	Tools	Search Currencies			
▲#	Name	Market Cap	Price	Volume (24h)	Circulating Supply	Change (24h)	Price Graph (7d)
1	 Bitcoin	\$304 817 759 925	\$18 196,50	\$16 458 600 000	16 751 450 BTC	-4.80%	
2	 Ethereum	\$80 227 787 220	\$831,92	\$4 286 640 000	96 436 438 ETH	12.96%	
3	 Bitcoin Cash	\$39 791 341 549	\$2 359,54	\$3 530 230 000	16 864 025 BCH	21.08%	
4	 Ripple	\$31 230 840 010	\$0,806183	\$1 701 070 000	38 739 144 847 XRP *	7.81%	
5	 Litecoin	\$19 172 601 218	\$352,59	\$2 520 010 000	54 376 783 LTC	9.40%	
6	 Cardano	\$14 193 308 079	\$0,547432	\$342 951 000	25 927 070 538 ADA *	12.33%	
7	 IOTA	\$10 790 692 465	\$3,88	\$347 054 000	2 779 530 283 MIOTA *	-4.46%	
8	 Dash	\$9 372 175 874	\$1 207,38	\$340 340 000	7 762 408 DASH	9.67%	
9	 NEM	\$8 420 786 999	\$0,935643	\$228 215 000	8 999 999 999 XEM *	20.00%	
10	 Monero	\$5 810 051 804	\$374,91	\$292 978 000	15 497 356 XMR	5.92%	
11	 Bitcoin Gold	\$5 583 373 623	\$334,03	\$407 836 000	16 715 136 BTG	7.98%	

## Exchange integration listing

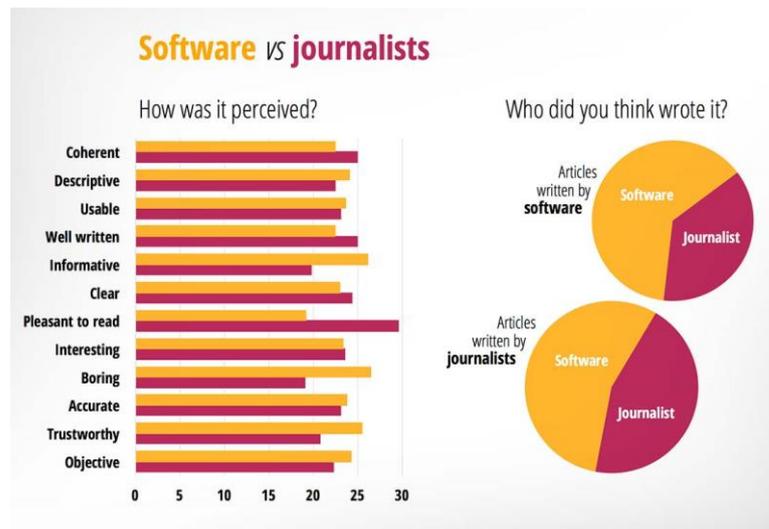
Listing on big token exchange platform to let everyone buy and sell NEWS tokens.

## The Plugin for Web CMS platforms

The Plugin for leading CMS platforms (Wordpress, Joomla, Drupal etc.) to let big media companies verify, certify, and acquire desired content automatically.

## The API for mass business

The API for The POST platform is the key tool for outer services and platforms for mass operations with content. The service is needed for big commercial companies, media, information agencies, publishers, and other content producers to acquire content in big quantities for ongoing content generation. There is no secret that, the percentage of content generated by robots is increasing every year. It's interesting to make note that quality of content produced by robots is quite competitive as compared with journalists:



<https://www.baekdal.com/blog/robots-vs-journalists-its-happening>

Our API gives to many organizations a handy tool enabling to get access to the huge “library” of original content and pay it off automatically. This will extremely accelerate business processes in these organization and reduce costs.

<http://contentmarketinginstitute.com/2017/11/content-creation-robots-examples/>

#### Smart Contracts for lease, sale, buy

The Smart Contract System has crucial importance for our service. The smart contracts will guarantee all transactions between parties each time when one party rents or buy some content belonging to another party.

#### SEO and SMM Applications

On the NEWS platform, there will be a mechanism for social media marketing (SMM), with functions based on smart contracts. Smart contracts collect statistics on content published in social networks and make transactions (to contract parties) based on afore created conditions (content KPI, total amount of downloads, likes etc.). Our system of smart contracts will be based on the Waves smart contracts which, together with our handy API, enable many participants of our system to integrate smart contracts to many other online services. Implementation of this mechanism gives the following advantages:

- for the content owner – the ability to lease content to a web site and to other NEWS market participants and get income;
- for content lessees – to link sum to be paid for the content and the content KPI;
- trusted instruments, which guarantee 100% implementation of contracts’ conditions;
- all content on the NEWS market becomes valuable and secure asset.