

BET-NG® Index Management Rules

Bucharest Exchange Trading Energy & Related Utilities® Index

Ver. 08.2018

BUCHAREST
STOCK
EXCHANGE

Contents

1. Introduction **3**

2. Calculation principles **4**

2.1. Basic information 4

2.2. Composition and selection criteria 4

2.3. Weighting factors 5

2.3.1. The free float factor 5

2.3.2. The representation factor 6

3. Calculation formula **7**

4. Adjustment procedures **8**

4.1. Periodic adjustments 8

4.2. Operational adjustments 9

4.2.1. Split/Consolidation 9

4.2.2. Bonus share issue 9

4.2.3. The right to subscribe new shares at a lower price than the market price 10

5. The Index Committee **11**

5.1. Overview 11

5.2. Members of the Index Committee 11

5.3. Decision making process 12

6. Index dissemination and copyright **14**

1. Introduction

1.1. This document presents the rules regarding the calculation principles, the selection criteria for the index constituents, the calculation formula and the index management principles of BET-NG (Bucharest Exchange Trading Energy & Related Utilities).

1.2. Within the *BET-NG Management Rules*, unless otherwise stated, the following abbreviations shall have the following meanings:

- "BVB" represents the Bucharest Stock Exchange S.A.;
- "BET-NG" represents the Bucharest Exchange Trading Energy & Related Utilities index;
- "IC" represents BVB's Index Committee, i.e. the committee which provides consultancy for the development of new BVB indices and participates to the adoption of the necessary operational measures related to these indices.

1.3. The rules herein and any amendments to this document are adopted by BVB's Index Committee and are approved by BVB's Board of Governors.

1.4. BET-NG index is a free float market capitalization weighted index for which the composition and weights are determined according to the principles presented in this document. The performance of the index can be replicated by a portfolio made out of shares included in the index. The procedure of calculating the index and changing the composition is based on transparent rules defined within this methodology. Any changes of these rules governing the index will be announced before their entry into force.

1.5. BET-NG index in national currency (RON) is calculated and disseminated by BVB in real time, on each day BVB is open for trading.

1.6. BET-NG index denominated in EUR and USD is published daily, after the closing of the trading session, using the currency exchange ratios published by the National Bank of Romania (NBR) for that day.

1.7. All relevant information regarding BET-NG index are made available to the public through press releases or BVB's webpage, www.bvb.ro.

1.8. BVB holds all rights for BET-NG index as full owner of the index.

2. Calculation principles

2.1. Basic information

2.1.1. BET-NG index was launched on July 1, 2008, with a start value of 1,000 points, retroactively computed at January 2, 2007.

2.1.2. Due to its methodology, BET-NG can be used as underlying for derivatives (futures, options, etc.) and structured products (warrants, certificates, etc.).

2.1.3. BET-NG is a sector index which reflects the evolution of all the companies listed on BVB's regulated market included in the energy and related utilities sector, selected also based on qualitative criteria.

2.1.4. The number of BET-NG constituents is variable.

2.1.5. BET-NG index takes into consideration the transactions registered on the main market segment ("regular").

2.1.6. In case of corporate events with a significant impact on the market price of the BET-NG constituents (such as: splits, consolidations, share capital increases, etc.), the operational index adjustments will be done so that the continuity of BET-NG index values is ensured, thereby avoiding artificial price influences from such events.

2.1.7. BET-NG index will not be adjusted for dividends.

2.2. Compozitie si criterii de selectie

2.2.1. BET-NG index includes all the companies listed on BVB's regulated market included in the energy and related utilities sectors that are selected also on qualitative criteria except for undertakings for collective investment of transferable securities as well as other categories of entities as established by the IC.

2.2.2. After eligible companies are determined using the criterion described above, they are also tested against the qualitative criteria detailed below:

- Relevant features considered by the IC, as the case may be: the company's financial and legal standing, the company's transparency, investors' interest, etc.
- Current and periodic reports as well as financial results submitted in English, reporting according to IFRS, etc.;
- the quality of Investor Relations activities (disclosure through BVB's website and/or another platform designated by BVB, periodic meetings/conferences with analysts &

investors, etc.).

The IC may modify, enlarge, narrow the range and content of these obligations.

2.2.3. Decisions regarding the inclusion and exclusion of companies in and from the index are taken by the IC, as decisional body, on a half-yearly basis, during the periodic meetings held in the first week of March and September. The changes in index composition are made available to the public as soon as possible after the IC decisions are made, but not later than the next working day.

2.2.4. Exceptionally, the IC meets urgently and can decide upon the inclusion and exclusion of companies in and from the index. In such situations, the Index Committee's decisions are made public immediately.

2.2.5. The IC can decide upon a company being included/retained in the index, even if the selection criteria stated at 2.2.2 are only partially met.

2.2.6. The IC can decide to exclude a company from the index if at least one criterion from those stated in art. 2.2.2 is not met.

2.3. Weighting factors

The weight of each BET-NG constituent is determined by adjusting its market capitalization by the free float factor and representation factor.

free float market capitalization of an index constituent = price x number of shares outstanding x free float factor x representation factor x price correction factor

2.3.1. The free float factor

a. The free float factor of a BET-NG constituent represents the number of shares issued and available for trading.

b. For a company, the free float in absolute value is estimated as being the total number of shares issued by the company, of which the following are excluded:

- treasury stocks;
- the shares held by the State or other government agencies, strategic investors, majority shareholders;
- any holding of at least 30% owned by insurance companies, pension funds, investment funds;
- any holding of at least 5% owned by other investor categories.

c. A company's free float expressed as a percentage is determined as the ratio between the free float in absolute value and the total number of shares issued and registered in the shareholders' registry.

d. The weight of each constituent of BET-NG index is adjusted with the corresponding free float factor, so that a company with a large market capitalization but a small free float cannot heavily influence the index and that the index reflects the realistic investment opportunities of the individual shares.

e. In BET-NG index, for each constituent, the free float factor can take one of the following values: {0.1, 0.2, 0.3, 0.4, 0.5, 0.6, 0.7, 0.8, 0.9, 1.0}, by rounding up the relative free float value of that company.

f. The free float factor that adjusts the market capitalization of each index constituent is revised quarterly by the Index Committee, if necessary, based on the shareholders' structure available.

2.3.2. The representation factor

a. The purpose of applying the representation factor is to cap the weight of a company in BET-NG index.

b. Applying the representation factor ensures that an index constituent cannot exceed the maximum weighting cap of 30% in BET-NG, at the date of the adjustment.

c. The representation factors can take values between 0.001 and 1.0.

d. The representation factors are analyzed and recalculated quarterly on the occasion of the periodic adjustment of the index.

e. In case of an adjustment that follows the inclusion/exclusion of a company in/from the index which significantly affects the companies' weightings in the index, an immediate review of the representation factors will be considered.

3. Calculation formula

The calculation formula for BET-NG index is:

$$BET\text{-}NG_T = BET\text{-}NG_{T\text{-}1} \times \frac{\sum_{i=1,N} p_{i,T} \times q_{i,T} \times Ff_i \times R_i \times c_{i,T}}{\sum_{i=1,N} p_{i,T-1} \times q_{i,T} \times Ff_i \times R_i \times c_{i,T-1}}$$

where:

BET-NG$_T$ - value of BET-NG at time T

BET-NG$_{T-1}$ - value of BET-NG at time T-1

$p_{i,T}$ - price of the i-th stock at time T

$p_{i,T-1}$ - price of the i-th stock at time T-1

$q_{i,T}$ - number of shares of the i-th stock at time T

Ff_i - the free float factor of the i-th stock; it is calculated with two decimal places and can take the following values: {0.1, 0.2, 0.3, 0.4, 0.5, 0.6, 0.7, 0.8, 0.9, 1.0}

R_i - the representation factor of the i-th stock; it is calculated with 3 decimal places; it can take values between 0 and 1

$c_{i,T}$ - the price correction factor for the i-th stock at time T on operational adjustment dates; it is calculated with 6 decimal places

$c_{i,T-1}$ - the price correction factor for the i-th stock at time T-1 on operational adjustment dates; it is calculated with 6 decimal places

N - the number of companies included in BET-NG

The calculation formulas for BET-NG USD and BET-NG EUR are:

BET-NG USD$_T$ = (NBR exchange rate for USD at time T-1 / NBR exchange rate for USD at time T) x (BET-NG RON$_T$ / BET-NG RON$_{T-1}$) x BET-NG USD$_{T-1}$

BET-NG EUR$_T$ = (NBR exchange rate for EUR at time T-1 / NBR exchange rate for EUR at time T) x (BET-NG RON$_T$ / BET-NG RON$_{T-1}$) x BET-NG EUR$_{T-1}$

4. Adjustment procedures

4.1. Periodic adjustments

a. BET-NG adjustments are done quarterly, based on IC decisions, to update the BET-NG constituents' weights following:

   i. corporate events (share capital increases, splits, consolidations, etc.);

   ii. changes of the index composition following the inclusion/exclusion of a company (based on decisions taken by the IC during March and September meetings);

   iii. the market price evolution of the index constituents' shares.

b. Usually, the periodic adjustments are made five trading days before the end of the futures contracts quarterly cycle March-June-September-December, so that they become effective on the first trading day following the futures contract expiry date.

c. If on the date of the periodic adjustment an index constituent is suspended from trading or in any other exceptional cases, the Index Committee may decide upon postponing the periodic adjustment related procedures or upon changing the date at which the periodic adjustment is made and/or the date on which they become effective. If a decision of such a postponement is taken, with regard to periodic adjustments, as well as the date on which they become effective, BVB will inform the public in due time about this decision and the reasons for being taken. If possible, the Index Committee will communicate the new date when the periodic adjustment will be done and the date when the adjustment becomes effective.

Corporate events

a. If the number of shares issued by a BET-NG constituent changes between two periodic adjustments following a share capital increase/decrease, a split/consolidation, the new number of shares issued as registered in the shareholders' registry[1] will be included in the index at the next periodic adjustment.

b. In case of other corporate events, the periodic adjustments are to be done according to the stipulations of this document.

[1] *This reference is needed given the long period of time (generally 2-3 months) between the share capital increase/decrease, split/consolidation decision is taken by the AGM and the effective registry date of the new shares in the shareholders' registry.*

4.2. Operational adjustments

a. Operational adjustments are made to correct the artificial influences of corporate events on BET-NG index.

b. The operational adjustments are technically implemented through the price correction factor $c_{i,T}$. This factor is taken into account for index calculation starting the first trade on the main market ("regular") of the trading day when the trading price changes according to the corporate event announced by the index constituent (*ex-date*).

c. The operational adjustments may refer to the following corporate events, without being limited to: splits, consolidations, bonus shares issues, the right to subscribe to new shares at a lower price than the market price etc.

d. For company i, the price correction factor $c_{i,T}$ is rebased to 1 at every index quarterly adjustment if this is done at the same time with the change of the number of shares issued and registered in the shareholders' registry.

4.2.1. Split/Consolidation

If an index constituent decides upon a shares split/consolidation, the price correction factor $c_{i,T}$ is determined as follows:

$$c_{i,T} = \frac{q_{i,T}}{q_{i,T-1}}$$

where:

$q_{i,T}$ - number of shares of stock i at time T

$q_{i,T-1}$ - number of shares of stock i at time T-1

4.2.2. Bonus share issue

If an index constituent carries out a bonus share issue, the price correction factor $c_{i,T}$ is determined as follows:

$$c_{i,T} = 1 + \frac{q_{i,bonus}}{q_{i,T-1}}$$

where:

$q_{i,bonus}$ - number of bonus shares for stock i

$q_{i,T-1}$ - initial number of shares for stock i at time T-1

4.2.3. The right to subscribe to new shares at a lower price than the market price

If an index constituent offers to its shareholders the right to subscribe new shares at a lower price than the market price, the price correction factor $c_{i,T}$ is determined as follows:

$$c_{i,T} = \frac{p_{i,T-1}}{p_{i,T-1} - \left[\left(p_{i,T-1} - p_s\right)/\left(R_s + 1\right)\right]}$$

where:

$p_{i,T-1}$ - price of stock i at time T-1

p_s - subscription price for the new shares

R_s - subscription ratio for the new shares

When index constituents announce other types of corporate events than those presented above, BVB's IC will calculate and disseminate to the public the new price correction factor $c_{i,T}$ which will be taken into account for index calculation, in order to ensure the continuity and relevance of the index.

Also, the IC will calculate and notify the public regarding the $c_{i,T}$ factor value when two or more types of corporate events overlap on the same date.

5. The index committee

5.1. Overview

BVB's Index Committee is organized in accordance with the stipulations of the Regulation on the Organization and Functioning of BVB and the decisions of BVB's Board of Governors, and operates in line with the powers delegated by the Board.

5.2. Members of the Index Committee

5.2.1. Members with voting rights

a. The nomination and revocation of BVB's Index Committee members are made by BVB's Board of Governors.

b. The Index Committee has 5 voting members (natural persons):

- President of BVB's Board of Governors, acting as President of the IC;
- BVB's General Manager;
- 2 representatives of Participants to BVB's trading system from the research, development, actuary, new products or asset management department;
- a representative of CFA Romania.

c. Each member is entitled to one vote. The delegation of voting rights is not accepted.

d. In case of vacancy, the President of the Index Committee will submit a nomination for approval of the Board of Governors. The new mandate will be valid until the expiration of the previous member mandate. Any event that leads to the inability of exercising of a member's duties for 30 consecutive days is deemed to be a definitive impossibility of exercising the member's mandate.

e. The term of a mandate of a member in BVB's Index Committee is 2 years, counting from the date of appointment by BVB's Board of Governors.

f. The decision making principle is the simple majority. The Index Committee has quorum when at least 3 voting members are present at the meeting, of which one is the President.

g. The President can invite to Index Committee meetings: members of the Board of Governors, of CFA Romania, specialists from research, development, actuary, new products or asset management departments of Participants to BVB's trading system, credit institutions,

specialists from financial institutions issuing financial products underlying BVB indices, representatives of issuers, as well as academic personnel and other experts.

5.2.2. Obligations and responsibilities

a. BVB's Index Committee takes decisions regarding the composition, calculation methodology and the adjustment of BVB indices, and makes proposals to BVB's Board of Governors regarding the strategy of BVB indices.

b. Index Committee members have the obligation to maintain confidentiality with regard to all the data and information they have been in contact with as members of the Index Committee, to act objectively and in good faith, in the interest of the capital market and investors, as well as for their protection.

c. The President of BVB's Index Committee will be notified with regard to any conflict of interest before the start of the meeting. The members of the Index Committee in conflict of interest to any of the items of the meeting agenda will abstain from debate and voting.

d. In addition, the following measures are meant to ensure the objectivity in the index management process:

   i. The calculation of the index and identification of its constituents are based on transparent principles, as defined in this methodology;

   ii. IC decisions are taken with majority of votes;

   iii. IC members have the obligation to act objectively, in the general interest of the market and investors;

   iv. IC decisions are made public as soon as possible.

e. Decisions are taken by the IC following internal discussions, based on documentation and information made available by the Committee's Secretariat, and considering the provisions of letter c) stated above.

5.3. Decision making process

5.3.1. As a rule, BVB's IC holds its sessions in the first week of the last month of each quarter, i.e. in March, June, September and December, to decide upon the following:

   i. periodic adjustment of the index;

   ii. inclusion/exclusion of companies in/from the index (meetings held in March and September)

   iii. general issues and strategic index policy.

5.3.2. Apart from meetings held for the periodic index adjustment, the IC can meet urgently in extraordinary circumstances which are not explicitly described in this methodology, in order to

take the necessary decisions to ensure the continuity of BET-NG index.

5.3.3. For decision making, the simple majority is needed. In case of equality of votes, the IC's President has the decisive vote.

5.3.4. The President of the Index Committee chairs the meeting.

6. Index dissemination and copyright

6.1. The index values, as well as any changes in the index composition, are published on BVB's website www.bvb.ro. Index real-time data is available via data vendors and BVB's website, implicitly as part of BVB's data monitoring products. The closing values of the index are included in the daily market statistics, in monthly bulletins and other BVB statistical products.

6.2. The designation "Bucharest Exchange Trading Energy & Related Utilities" and the abbreviation "BET-NG" are protected by legislation related to the protection of intellectual and industrial property rights. The Bucharest Stock Exchange reserves the property right of BET-NG index. The use of the index as underlying for derivatives and/or structured products is prohibited without BVB's prior consent.

Disclaimer

This document provides the principles and rules underlying the construction and the management of *BET-NG (Bucharest Exchange Trading Energy & Related Utilities)* index. BVB reserves the right to manage BET-NG index transparently, neutrally and in the best possible manner, in accordance of these index rules. BVB doesn't assume any responsibility for any errors or changes in the way the respective rules are applied in certain circumstances, nor for any loss that might derive from this.