EUROPEAN FUND FOR STRATEGIC INVESTMENTS

STEERING BOARD

EIB EFSI MULTIPLIER METHODOLOGY CALCULATION
UPDATE OF JULY 2018

Joint proposal by EC and EIB
Questions concerning this note should be referred to EFSI Secretariat: e-mail: EFSISecretariat@eib.org
As foreseen in the EFSI Regulation\(^1\) and translated into the EFSI Agreement, one of the Key Performance Indicators of EFSI is the investment impact, with an overall target of at least EUR 500bn to be generated on the basis of an overall EFSI contribution of the EU and the EIB of EUR 33.5bn. This represents a target of an EFSI Global Multiplier Effect of 15x.

While, the total estimated EFSI Global Multiplier can only be measured on portfolio level at the end of the investment period, it is expected that, under the Innovation and Infrastructure Window (IIW) of EFSI, the EIB estimates and monitors also transaction-specific EFSI Global Multiplier Effects.\(^2\) The EIB will also monitor the investment mobilised at project completion in order to measure the achieved multiplier effect.

In order to achieve this, clear rules and coherent assumptions for the estimation of transaction-specific EFSI Global Multiplier Effects are established in this EIB EFSI Multiplier Calculation Methodology. The methodology provides a framework linking the underlying available EFSI contribution with (a) the amount of EIB financing under EFSI and (b) the amount of total EFSI eligible investment that is expected to be generated by such financing.

One key consideration in defining the total EFSI eligible investment expected to be generated by EFSI financing concerns the causal relationship between EFSI financing and investment. Causality in the context of policy intervention refers to the question of whether the intervention causes the desired output, outcome or impact. This cause and effect relationship is generally difficult to demonstrate, especially ex-ante or during the design or implementation phase of the policy itself. The present methodology aims at identifying the investment mobilised in the context of EFSI operations although the causality of EFSI as a policy intervention to address the investment gap in Europe is difficult to demonstrate and cannot be conclusively proven. Depending on the data availability, statistical analysis may be conducted ex-post to provide an estimate of causality.

However, one can establish a link between EIB support under EFSI, other sources of financing and the real investment related to EFSI operations. EIB support under EFSI catalyses other sources of financing to EFSI operations, and while the causality from EFSI support to this other

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\(^2\) Ex-ante estimation and monitoring by the EIB should not be interpreted as an exclusion criterion for individual projects which do not meet the 15x EFSI Global Multiplier Effect.
financing cannot be conclusively proven, a link can be established between them. Similarly, the external multiplier, the relationship between EIB EFSI Financing Volume and EFSI Eligible Investment Mobilised, provides a project specific estimate of the extent to which EFSI support can be linked to new investment. Moreover, EFSI support is designed to be complementary to existing financial instruments, existing Union programmes or other sources of Union funds or joint instruments. More importantly EFSI support is only granted in support of operations that meet the criterion of providing additionality as defined in the EFSI Regulation.

The EIF-EFSI Multiplier Calculation Methodology under the SME Window (SMEW), which is in line with the EIF’s mandate of supporting SMEs, is set out in a different document. This EIB methodology is conceptually in line with that of the EIF.\(^3\)

The multipliers referred to in this document will be established and their final outcome value calculated in line with the processing of key performance and monitoring indicators foreseen in the EFSI Agreement and Key Performance Indicators – Key Monitoring Indicators Methodology (KPI-KMI Methodology).

### 1. KEY ELEMENTS OF THE METHODOLOGY

The EIB EFSI multiplier methodology is comprised of two independent factors as outlined below:

\[
 \text{Internal Multiplier (IM)} \times \text{External Multiplier(EM)} = \text{EFSI Global Multiplier}
\]

(A) \( \text{IM} = \frac{\text{EIB EFSI Financing Volume}}{\text{EFSI Contribution}} \)

For Direct Operations:

(B) \( \text{EM} = \frac{\text{EFSI Eligible Investment Mobilised}}{\text{EIB EFSI financing volume}} \)

For Intermediated Operations:

(C) \( \text{EM} = (\text{Catalytic effect; CE}) \times (\text{Project Level External Multiplier, EM}) \)

(D) \( \text{EM} = \frac{\text{EFSI Eligible Investment Mobilised}}{(\text{Financing amount from the Intermediary})} \)

(E) \( \text{CE} = \frac{(\text{Financing Amount from the Intermediary})}{(\text{EIB EFSI Financing Volume})} \)

EIB EFSI Financing Volume: In the case of EFSI (as well as in other EU/EIB schemes), the applied amount for the Bank’s financing volume shall include only EFSI financing and not financing provided from other EIB financing schemes.

More than one EIB EFSI financing for one project: if there is more than one EIB EFSI financing for one operation, the EFSI Eligible Investment Mobilised related to the first operation under EFSI shall be estimated according to the EIB EFSI Multiplier Calculation Methodology. Should there be subsequent EIB EFSI financing for the operation, the EM would be 0x in order to avoid double counting. If the subsequent EIB EFSI financing supports incremental EFSI Eligible Investment Mobilised not considered under the previous operation(s), the EM shall reflect the incremental EFSI Eligible Investment Mobilised, as such:

(F) \( \text{EM} = \frac{\text{EFSI Eligible Investment Mobilised not Considered in Previous Operation(s)}}{(\text{Subsequent EIB EFSI Financing Volume})} \)

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\(^3\) EIB operations implemented by the EIF under IIW, namely investments in or co-investments with funds, follow the EIF-EFSI Multiplier Calculation Methodology.
EFSI Eligible Investment Mobilised for pre-approvals is estimated at the envelope level if possible. EFSI Eligible Investment Mobilised is estimated and reported for each underlying operation.

Timing of calculations: the EFSI Eligible Investment Mobilised and multiplier shall be estimated at the approval by the EIB Board of Directors, and their final value will be based on amounts as calculated in the Project Completion Report for operations that have been completed and for which a Project Completion Report has been finalised. For investment funds, these indicators will be updated at the time of signature of EIB EFSI participation in the relevant closing(s), at the fund’s final closing and at project completion.

A partial cancellation of the authorised financing amount is considered an intermediate completion event, and the EFSI Eligible Investment Mobilised and multipliers shall be revised at the time when the partial cancellation becomes effective.

The treatment of double-counting in operations where both the EIB and the EIF are present under EFSI is explained in the KPI-KMI Methodology.

In cross-border operations involving non-EU geographies or entities, only EFSI Eligible Investment Mobilised within the EU shall count towards the EUR 500bn target.

2. **Internal Multiplier (IM)**

The IM represents the relationship between the available EFSI contribution and EIB financing under EFSI. At portfolio level, it can only be measured at the end of the EFSI Investment Period. As foreseen in the EFSI Agreement, the EFSI guarantee takes the form of a Portfolio First Loss Piece (PFLP) for the IIW Debt Portfolio and for IIW Equity Type Portfolio – NPBs. For IIW Equity Type Portfolio – Standard, EFSI contribution corresponds to the actual amount of EIB financing.

Under IIW Debt Portfolio, during and at the end of the investment period, the Net Available PFLP shall be of such a size as to allow EIB to retain an acceptable risk on the respective Residual Risk Tranches (RRTs). As foreseen in the EFSI Agreement, as an initial configuration, this portfolio comprises:

- **IIW Debt Portfolio – Standard**: the size of the Net Available PFLP is expected to be approximately 25% for IIW Debt Portfolio – Standard at the end of the investment period, enabling that every EUR of EFSI guarantee leads on average to EUR 4 of EIB EFSI financing. Therefore, the ex-ante IM on project level is set at 4x for all debt-type operations falling at approval under IIW Debt Portfolio – Standard.

- **IIW Debt Portfolio – Hybrid**: the size of the Net Available PFLP is expected to be approximately 33% for the IIW Debt Portfolio – Hybrid at the end of the investment period, enabling that every EUR of EFSI guarantee leads on average to EUR 3 of EIB EFSI financing. Therefore, the ex-ante IM on project level is set at 3x for all debt-type operations falling at approval under IIW Debt Portfolio – Hybrid.

Under IIW Equity Portfolio, as foreseen in the EFSI Agreement, as an initial configuration, this portfolio comprises:

- **IIW Equity Type Portfolio - Standard**: at any point in time, during and at the end of the Investment Period, the IIW Equity Portfolio - Standard shall be of such a size as to allow EIB to retain negligible residual risk. EIB shall invest pari passu for each equity-type operation within the IIW Equity Type Portfolio - Standard the same amount on own risk basis. Therefore, the IM is set at 1x for all equity-type operations falling under IIW Equity Type Portfolio – Standard.

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4. These are umbrella operations that have been approved under EFSI but which cannot be counted towards the EFSI objective until concrete “sub-projects” have been signed.

5. For operations that require a two-stage approval, the EFSI Eligible Investment Mobilised and multipliers shall be revised at each approval stage.

6. As defined in the EFSI Agreement, Investment Period means the period commencing on 22 July 2015 and ending on 31 December 2022 for EFSI Guaranteed Operations approved on or before 31 December 2020 by the Investment Committee or, as regards the Transitional Operations, the Commission and the EIB Board of Directors.

7. Shall this initial configuration be amended, the ex-ante IM will be defined in the documents explaining such amendments.

8. Shall this initial configuration be amended, the ex-ante IM will be defined in the documents explaining such amendments.
- **IIW Equity Type Portfolio – NPBs**: During and at the end of the Investment Period, the Net Available PFLP in respect of the IIW Equity Type Portfolio – NPBs shall be of such a size as to allow EIB to retain an acceptable risk on the RRT. The size of the Net Available PFLP in respect of the IIW Equity Type Portfolio – NPBs is expected to be approximately 40% at the end of the Investment Period. Therefore, the IM on project level is set at 2.5x for all equity-type operations falling at approval under IIW Equity Type Portfolio – NPBs.

### 3. External Multiplier (EM)

The EM captures the relationship between the EIB EFSI Financing Volume and the EFSI Eligible Investment Mobilised. To calculate the EM, a distinction is made between Direct Operations on the one hand and Intermediated Operations on the other, as defined in subsequent sections.

The EM is subject to an economic feasibility check by the Projects Directorate of the EIB and, if warranted, it is adjusted following the principles below.

In general, the EM varies across different financial products. Equity-type financing is more effective in crowding in additional finance, followed by junior debt and senior debt. An EM of 3x can be considered a benchmark for senior debt, both based on past experience of the EIB and on the observation that financing at least one-third of any project is bound to be critical for the project to happen. Similar reasoning applies to junior debt and equity-type financing, where the corresponding reasonable benchmarks can be set at 5x and 15x, respectively.

The table below summarises the benchmark EM for the three product categories. Should the ex-ante EM result in a value that is sufficiently close to those shown, then that EM value can be considered economically feasible. “Sufficiently close” is interpreted as not deviating by more than about one-third from the benchmark.

<table>
<thead>
<tr>
<th>Financial Products: Transaction Type</th>
<th>Benchmark External Multiplier</th>
</tr>
</thead>
<tbody>
<tr>
<td>Equity-Type:</td>
<td>15x</td>
</tr>
<tr>
<td>- Quasi-Equity</td>
<td>8.9x⁹</td>
</tr>
<tr>
<td>- Infrastructure and other types of funds</td>
<td>20x</td>
</tr>
<tr>
<td>Junior Debt/ Credit Enhancement</td>
<td>5x</td>
</tr>
<tr>
<td>Senior Debt</td>
<td>3x</td>
</tr>
</tbody>
</table>

If the EM deviates from the respective range mentioned above, the Board report should include a narrative supporting the multiplier calculation. If the EIB EFSI financing is associated with only one part of the project then the EFSI Eligible Investment Mobilised should equal to that part of the project with which the financing is associated, together with a supporting narrative in the Board report.

#### 3.1. External Multiplier (EM) – Direct Operations¹⁰

⁹ The EM of 8.9x is based on an empirical study on venture capital investments in Europe in healthcare, ICT and industrials sectors, which analysed eligible components of investments undertaken by a sample of SMEs and Mid-Caps within a seven-year period.

¹⁰ Direct Operations include inter alia investment loans, framework loans, direct guarantees and credit enhancement provided to investment projects, hybrid-debt instruments, equity-type financing for corporates and project finance, and quasi-equity financing for SMEs and Mid-Caps.
Formula (B) \[ EM = \frac{(EFSI \text{ Eligible Investment Mobilised})}{(EIB \text{ EFSI Financing Volume})} \]

The EM relationship between EIB EFSI Financing Volume and EFSI Eligible Investment Mobilised is illustrated in the diagram below.

EFSI Eligible Investment Mobilised is measured as the Eligible Project Investment Cost (EPIC) defined according to EIB Methodology. Project cost components that are not EFSI eligible, such as investments outside the EU or investments outside the scope of the EFSI Regulation, are excluded from the EFSI Eligible Investment Mobilised. The EM is then calculated by dividing the EFSI Eligible Investment Mobilised by the EIB EFSI Financing Volume.

EU co-financing: If EU grant-financing, EU financial instruments or ESIF grants or financial instruments (including related national co-financing) are used to co-finance the proposed project, this amount shall be deducted from the Project Investment Cost (PIC) for the calculation of the EM.

Framework Loans (FL): In the case of FLs (one counterpart, multiple small projects to be included in the future), should it not be known at the time of approval/signature what exact EPIC amounts will be supported under the FL, the EM would be considered to be 3x.

Quasi-Equity for SMEs and Mid-Caps: The EFSI Eligible Investment Mobilised equals to the EFSI eligible investment plan for a seven-year period. For SMEs and small Mid-Caps that cannot provide such plans due to the nature and rapid expected growth of companies, the EM of 8.9x is used.

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11 In accordance with Article 5.14 of the EFSI Agreement, operations proposed to the Investment Committee as potential EFSI Guaranteed Operations shall have undergone the EIB standard due diligence and approval process taking into account the nature of the Product as per EIB rules, policies and procedures. For Quasi-Equity Operations for SMEs and Mid-Caps, the EFSI Eligible Investment Mobilised spans over a seven-year period, in order to reflect more accurately the impact of EIB EFSI financing on the longer term as EFSI support comes at an early stage of development of the entity benefiting from EIB EFSI financing, when financing is most difficult to ensure. EFSI support thus not only mobilises investments directly related to EIB EFSI financing, but also triggers additional financing and investment capacity directly associated with it. For the avoidance of doubt, the financing structure of such operations typically extends to around seven years, when including the availability period.

12 The EM of 8.9x is based on an empirical study on venture capital investments in Europe in healthcare, ICT and industrials sectors, which analysed eligible components of investments undertaken by a sample of SMEs and Mid-Caps within a seven-year period.
3.2. External Multiplier (EM) – Intermediated Operations

\[
\text{Formula (C)} \quad \text{EM} = (\text{Catalytic effect; CE}) \times (\text{Project Level External Multiplier, EM}^*)
\]

\[
\text{Formula (D)} \quad \text{EM}^* = (\text{EFSI Eligible Investment Mobilised}) / (\text{Financing amount from Intermediary})
\]

\[
\text{Formula (E)} \quad \text{CE} = (\text{Financing amount from Intermediary}) / (\text{EIB EFSI Financing Volume})
\]

In Intermediated Operations, the EM as described above is enhanced through co-financing on the level of the financial intermediary (e.g. investment fund, NPB/NPI, bank, leasing company). This additional factor is called the "Catalytic Effect" (CE), which is to be multiplied with the EM at project level (EM*). The chart below provides an illustration of this relationship.

3.2.1 Investment Funds: the notion of CE is captured by identifying the part of the targeted size of the fund which would be available for investments and which would be generated in the closings in which EIB participates under EFSI, "EFSI Participation Fund Size". Past closings are in general not considered for this calculation.

To calculate the expected CE, fees are excluded from the EFSI Participation Fund Size, which is then divided by the proposed EIB EFSI Financing Volume. The benchmark for the CE is 4x; values above that will be explicitly justified in relevant EIB due diligence documentation.

\[
\text{Formula (E)} \quad \text{CE} = (\text{EFSI Participation Fund Size Net of Fees}) / (\text{EIB EFSI Financing Volume})
\]

This approach will represent the expected CE at the moment of the approval of the EIB EFSI financing. The expected CE will be updated, where needed, at the time of signature of EIB/EFSI participation in the relevant closing(s) and at the fund's final closing. The realised CE will be calculated at project completion at the end of the fund's investment period based on actual investments made by the fund.

The expected CE shall be further multiplied by EM* to obtain the EM. The benchmark for the total EM for intermediated equity financing is 20x.

\[
\text{Formula (D)} \quad \text{EM}^* = (\text{EFSI Eligible Investment Mobilised}) / (\text{EFSI Participation Fund Size Net of Fees})
\]

13 The EM shall reflect all layers of intermediation, such as in risk-sharing or fund of funds structures.
14 In very exceptional cases, when it is impossible for a fund to invest prior to EIB financing under EFSI, and when there is clear evidence that EIB financing under EFSI unlocks the investment of the fund, prior closing(s) shall also be considered as EFSI eligible as duly documented.
15 Fees cover equalisation, management and other costs associated to the establishment, operation and closing of the fund. When management fees and other costs are recovered from revenues from the underlying investments, they are not deducted from the EFSI Participation Fund Size when duly justified.
The EPIC and thus the EFSI Eligible Investment Mobilised of the underlying projects is generally calculated on the basis of the pipeline of investments provided by the fund at approval. Should such information not be available, the EFSI Eligible Investment Mobilised shall be based on assumptions about the debt to equity ratios of the projects that the fund invests in and the fund’s share in the projects’ equity or debt. In the case of corporate investments, the EFSI Eligible Investment Mobilised is based on investments associated with the purchase of new equity by the fund.

The example below provides an illustration of the calculation of the EM in case of an investment fund operation.

**Example 1:** EIB invests EUR 30m under EFSI in a second and final closing (EUR 150m) in an infrastructure fund with a target fund size of EUR 250m. Management fees are estimated at 10% of the EFSI Participation Fund Size. The EFSI Participation Fund Size Net of Fees would equal to EUR 135m (=EUR 150m × 90%).

The fund normally provides ca. 50% of the equity in any infrastructure project (the typical equity ratio of the targeted project is 20%). According to its investment policies, the fund invests 15% in projects outside the EU and 85% inside the EU.

When EU financing is provided to the fund, the EFSI Eligible Investment Mobilised shall be split pro-rata between the EU and the EIB contributions to the fund.

**Example 2:** Similar set-up as in Example 1 with an ESIF contribution to the fund, including the related national co-financing, of EUR 20m. The estimated EFSI Eligible Investment Mobilised of the fund of EUR 1.15bn (as calculated in Example 1) is allocated pro-rata between ESIF contribution and EIB/EFSI financing, i.e. 2/5 (=20m/50m) is allocated to ESIF and 3/5 (=30m/50m) to EIB/EFSI financing.
3.2.2. **Co-investments with funds**: when EIB under EFSI invests into a company or finances a project alongside a fund into which EIB Group has previously invested under EFSI, the EM shall reflect the estimated incremental EFSI Eligible Investment Mobilised.

*Example 3: EIB EFSI financing of up to EUR 30m is provided to an operation that is a co-investment alongside a fund in which the EIB is already an investor under EFSI. The fund is providing 70m into the co-investment vehicle. As the fund has previously benefitted from EFSI support, to avoid double-counting, the already accounted EFSI Eligible Investment Mobilised by the fund needs to be deducted, referring to the initial assumptions of the EM* of the fund.*

**Step 1: Determine EFSI Eligible Investment Mobilised of the co-investment vehicle**

The EFSI Eligible Investment Mobilised of the co-investment vehicle shall be calculated in line with the EIB EFSI Multiplier Calculation Methodology. In this example, it is assumed that the EFSI Eligible Investment Mobilised of the co-investment vehicle is estimated at EUR 200m.

**Step 2: Determine the already accounted for EFSI Eligible Investment Mobilised by the fund (as previously documented at approval)**

Every operation with a fund that received EIB EFSI financing includes an ex-ante assessment of the EFSI Eligible Investment Mobilised, including also the estimated EM* related to the previously approved operation.

For example, if under the previous operation, the EFSI Participation Fund Size Net of Fees of EUR 200m led to an estimated EFSI Eligible Investment Mobilised of EUR 400m, then the EM* of the Fund was estimated at 2x. As the Fund provides EUR 70m in the co-investment vehicle, EUR 140m of EFSI Eligible Investment Mobilised (or 70m x 2x) has already been accounted for in the previously EIB-supported Fund operation (unless specifically ring-fenced and thus not accounted for in the EFSI Eligible Investment Mobilised of the fund).

**Step 3: Record the difference (if any) as the incremental EFSI Eligible Investment Mobilised and based on this amount calculate the EM of the new operation**

The amount calculated in Step 1 shall be netted of the amount in Step 2. In this example, only EUR 60m (or 200m – 140m) shall be counted towards the EFSI investment target, and the EM shall be based on this amount. Therefore, the EM for the operation shall be 2x (= 60m / 30m).

3.2.3. **Bank (Loan for SMEs & Mid-Caps / Risk Sharing / Loan Substitutes):**

In the case of Multiple Beneficiary Intermediated Loans (MBILs), EIB assumes the risks on the financial intermediaries. If the EIB guarantees under EFSI up to 25% of the financing amount from the intermediary, then the expected CE would be 4x; if 50% then the expected CE would be 2x.

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16 When prior EIB Group fund investment is from non-EFSI resources, the EM of the co-investment shall only reflect the fund’s commitment to the co-investment that has not yet been invested in the final beneficiary at the time of approval of the co-investment.
In risk-sharing operations (guarantees) where the EIB under EFSI assumes contractual risk on underlying transactions, each new transaction is an additional risk being analogous to the EIB extending a new loan to each of these individual transactions. Therefore, the CE shall correspond to the contractually targeted size of EFSI eligible SME/Mid-Cap/PF portfolio(s) related to these underlying transactions that the intermediary commits to creating. In case of revolving risk-sharing, such as supply chain financing, where the EIB financing is extended on a revolving basis to intermediaries, each iteration shall count towards the CE.

The expected CE shall be further multiplied by EM* to obtain the EM. For SMEs and Mid-Caps, the EM* is calculated assuming that the intermediary bank finances 70% of the Project Investment Cost. This is based on an average EU equity ratio of SMEs and Mid-Caps of 30%. Hence, EM* in these types of operations is assumed to be 1.4x\(^{17}\). This also applies to operations that provide working capital finance for SMEs and Mid-Caps. In risk-sharing operations where the targeted new portfolio includes project finance transactions, the EM* for that (part of the) portfolio shall be assessed based on the associated EPIC, further adjusted, where needed, for components that are not EFSI eligible.

\(^{17}\) Where possible, this assumption may be revised to reflect transaction pipeline specifics.