

+Call for Expertise: エキスパート募集

IO References: IO/26/CFE/10035182/CMA

“SOLPS-ITER matrix solver numerical improvement contract”

(SOLPS-ITER マトリックスソルバーの数値改善契約)

IO 締め切り 2026 年 7 月 15 日(水) (応募書類は ITER 機構へ直接提出のこと)

概要：

イーター機構（IO）では、上記タスクの支援をいただく作業を ITER 参加極の企業・機関等から募集します。応募を希望される企業・機関等は、所定の期限までに応募書類を直接 ITER 機構の下記担当までご提出下さい。

○ 今回の募集に関する書類は以下の通りです。

- ・ 招待状
- ・ 技術仕様書
- ・ 履歴書（CV）テンプレート
- ・ 見積もり提案書テンプレート
- ・ 誓約書
- ・ 守秘義務に関する誓約書(契約締結時に署名されること)

○ 応募者は、以下の申込用紙を ITER 機構に直接送付願います。

- ・ 履歴書（ITER 機構の招待状と技術仕様書で規定した要求事項と基準を満足していることを示す経験について明記されていること）
- ・ 誓約書（署名入り）
- ・ 見積もり提案書

（※提出書類は pdf ファイル 1 本にまとめて送付願います。）

○ 応募書類の提出先

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○はじめに

この事前情報通知 (PIN) のは、供給契約の審査および実行につながる公開入札調達プロセスの最初のステップです。この文書の目的は、作業範囲と入札プロセスに関する技術的内容の基本的な概要を提供することです。

○背景

ITER プロジェクトは、欧州連合 (EU) (EURATOM を代表とします)、日本、中華人民共和国、インド、韓国、ロシア連邦、米国の 7 カ国が共同出資する国際的な研究開発プロジェクトで、ITER 機構 (IO) の本部 (HQ) があるヨーロッパ、フランス南部のサン・ポール・レ・デュランスで建設されています。

ITER プロジェクトの組織面および技術面の詳細については、www.iter.org を参照してください。

○作業範囲

本ソフトウェアエンジニアリングサービス契約の目的は、「SOLPS-ITER マトリックスソルバーの数値改善契約」と題する技術仕様書に詳細に記載されているとおり、SOLPS-ITER コードスイートの B2.5 コンポーネント内においてプラズマ流体輸送計算に使用される行列ソルバーの数値的なロバスト性 (安定性・頑健性) を向上させることです。詳細は技術仕様書 G3V29P v1.3 (本 PIN 文書の附則 I) を参照下さい。

○調達プロセスと目的

目的は、競争入札プロセスを通じて供給契約を落札することです。

この入札のために選択された調達手続きは公開入札手続きと呼ばれます。

オープン入札手順は、次の 4 つの主要なステップで構成されています。

➤ ステップ 1-事前情報通知 (PIN)

事前情報通知は公開入札プロセスの第一段階です。IO は、関心のある候補企業に対し、10 作業日までに担当調達担当官に以下の情報を提出し、競争プロセスへの関心を示すよう正式に要請します。

-候補会社の名称

-登録国

-連絡先の名前、電子メール、タイトル、電話番号。

特に注意:

関心のある候補企業は、IO Ariba の電子調達ツール「IPROC」に登録してください (まだ登録していない場合)。手順については、<https://www.iter.org/fr/proc/overview> を参照してください。

Ariba (IPROC) に登録する際には、お取引先様に最低 1 名の担当者の登録をお願いします。この連絡担当者は、提案依頼書の発行通知を受け取り、必要と思われる場合は入札書類を同僚に転送することができます。

➤ ステップ 2-入札への招待

関心のある候補企業の完全登録後、提案依頼書 (RFP) を「IPROC」に掲載します。この段階では、担当の調達担当者に関心を示し、かつ IPROC に登録している関心のある候補企業は、RFP が公表された旨の通知を受けることができます。その後、RFP に詳述されている入札説明書に従って提案書を作成し、提出します。

このツールに登録されている企業のみが入札に招待され、登録されている企業は、自社の名前でのみ提案を提出できます。

➤ ステップ 3-入札評価プロセス

入札者の提案は、IO の公平な評価委員会によって評価されます。入札者は、技術的範囲に沿って、かつ、RFP に記載された特定の基準に従って作業を実施するために、技術的遵守を証明する詳細を提供しなければなりません。

➤ ステップ 4-落札

認定は、公開されている RFP に記載されている、コストに見合った最適な価格または技術的に準拠した最低価格に基づいて行われます。

○概略日程

概略日程は以下の通りです：

マイルストーン	暫定日程
IOWeb ページと DA との連絡により 事前指示書 (PIN) の発行	2026 年 7 月 3 日
関心表明フォームの提出	2026 年 7 月 15 日
IPROC での提案リクエスト (REP) の発行	2026 年 7 月 22 日
IPROC で入札提出	2026 年 8 月 10 日
入札評価と契約授与	2026 年 8 月 E
契約調印	2026 年 9 月中旬
契約開始	2026 年 9 月中下旬

○契約期間

予想される契約期間は、6 か月です。

○経験

入札者は、IO の技術的要件に沿った期待される支援を提供するにあたり、その知識と経験と能力があることを英語で示す必要があります。ITER での使用言語は英語です。流暢でプロレベルが必要です（スピーキングとライティング共に）。

○候補

参加は、個人またはグループ/コンソーシアムに参加するすべての法人に開放されます。法人とは、法的権利及び義務を有し、ITER加盟国内に設立された個人、企業又は機構をいいます。

法人は、単独で、またはコンソーシアムパートナーとして、同じ契約の複数の申請または入札に参加することはできません。共同事業体は、恒久的な、法的に確立されたグループ又は特定の入札手続のために非公式に構成されたグループとすることができます。

コンソーシアムのすべての構成員(すなわち、リーダーと他のすべてのメンバー)は、ITER 機構に対して連帯して責任を負います。

コンソーシアムとして許可されるために、その点で含まれる法人はコンソーシアムの各メンバーをまとめる権限をもつリーダーをもたなければなりません。このリーダーはコンソーシアムの各目メンバーのために責任を負わなければなりません。

指名されたコンソーシアムのリーダーは、入札段階でのカバーレター(入札への招待)で、コンソーシアムのメンバーの構成を説明する予定です。その後、候補者の構成は、いかなる変更もITER機構に通知することなく変更してはなりません。かかる認可の証拠は、すべてのコンソーシアムメンバーの法的に授権された署名者が署名した委任状の形式で、しかるべき時期にIOに提出しなければなりません。

どのコンソーシアムメンバーもIPROCに登録する必要があります。

【※ 詳しくは添付の英語版技術仕様書「**SOLPS-ITER matrix solver numerical improvement contract**」をご参照ください。】

ITER 機構のウェブサイト

<http://www.iter.org/org/team/adm/proc/overview> からもアクセスが可能です。

「核融合エネルギー研究開発部門」の HP : <http://www.fusion.qst.go.jp/ITER/index.html>
では ITER 機構からの各募集（IO 職員募集、IO 外部委託、IO エキスパート募集）を逐次更新しています。ぜひご確認ください。

PRIOR INFORMATION NOTICE (PIN)

IO/26/CFE/10035182/cma

SOLPS-ITER matrix solver numerical improvement contract

Procurement Officer in charge:

Cécile Mendoza - EXT

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Abstract.

The purpose of this PIN is to provide prior notification of the IO's intention to launch a competitive Call for Expertise process in the coming weeks. This PIN provides some basic information about the ITER Organization (the "IO"), the technical scope for this tender, and details of the tender process.

1 Introduction

This Prior Information Notice (PIN) is the first step of a Call for Expertise Procedure leading to the award and execution of a Service Contract.

The purpose of this document is to provide a basic summary of the technical content in terms of the scope of work, and the tendering process.

2 Background

The ITER project is an international research and development project jointly funded by its seven Members, being the European Union (represented by EURATOM), Japan, the People's Republic of China, India, the Republic of Korea, the Russian Federation and the USA. ITER is being constructed in Europe at St. Paul-Lez-Durance in southern France, which is also the location of the headquarters (HQ) of the ITER Organization (IO).

For a complete description of the ITER Project, covering both organizational and technical aspects of the Project, please visit www.iter.org.

3 Scope of Service

The purpose of this software engineering service contract titled "SOLPS-ITER matrix solver numerical improvement contract" is to improve the numerical robustness of the matrix solver used to compute plasma fluid transport inside the B2.5 component of the SOLPS-ITER code suite, as fully described in Technical Specifications ref. **G3V29P v1.3 (Annex I to this PIN document)**.

4 Procurement Objective & Process

The objective is to award a Contract through a competitive bidding process.

The procedure is comprised of the following four main steps:

➤ **Step 1- Prior Information Notice (PIN)**

The Prior Information Notice is the first stage of the process. The IO formally invites interested candidate companies to indicate their interest in the competitive process, within **10 calendar days**, by returning to the Procurement officer in charge the following information by the date indicated under paragraph 5 below:

- Name of candidate company
- Country of registration
- Point of contact name, email, title, and phone number.

Special attention:

Interested candidate companies are kindly requested to register in the IO Ariba e-procurement tool called “IPROC”, if not so done yet.

The process on how to do is described at the following link: <https://www.iter.org/fr/proc/overview>.

When registering in Ariba (IPROC), suppliers are kindly requested to register at least one contact person. This contact person will be receiving the notification of publication of the Request for Proposal and will then be able to forward the tender documents to colleagues if deemed necessary.

➤ **Step 2 - Request for Proposals**

After the full registration of interested candidate companies, the Request for Proposals (RFP) will be published in “IPROC”. This stage allows interested candidate companies who have indicated their interest to the Procurement Officer in charge AND who have registered in IPROC to receive the notification that the RFP is published. They will then prepare and submit their proposals in accordance with the tender instructions detailed in the RFP.

Only companies registered in this tool will be invited to the tender and registered company can only submit a proposal in their name.

➤ **Step 3 – Tender Evaluation Process**

Tenderers proposals will be evaluated by an impartial evaluation committee of the IO. Tenderers must provide details demonstrating their technical compliance to perform the work in line with the technical scope and in accordance with the particular criteria listed in the RFP (given in section 4.1.5).

Step 4 – Contract Award

The award will be done on the basis of best value for money or lowest price technically compliant offer as described in the published RFP.

5 Procurement Timetable

The tentative timetable is as follows:

Milestone	Date
Publication of the Prior Indicative Notice (PIN) on IO Webpage and communications with DAs	3 July 2026
Deadline for Submission of expression of interest form	15 July 2026
Request for Proposals (RFP) publishing on IPROC	22 July 2026
Tender Submission in IPROC	10 August 2026
Tender Evaluation & Contract Award	End of August 2026
Contract Signature	Mid-September 2026
Contract Commencement	Late September 2026

6 Contract Duration and Execution

The estimated contract duration shall be 6 months.

7 Experience

The tenderers shall demonstrate their knowledge, experience and capabilities in the implementation of providing expected support in accordance with the IO technical requirements.

The working language of ITER is English, and a fluent professional level is required (spoken and written).

8 Candidature

Participation is open to all legal entities participating either individually or in a grouping/consortium. A legal entity is a company, or organization that has legal rights and obligations and is established within an ITER Member State.

Legal entities cannot participate individually or as a consortium partner in more than one application or tender of the same contract. A consortium may be a permanent, legally established grouping, or a grouping which has been constituted informally for a specific tender procedure. All members of a consortium (i.e. the leader and all other members) are jointly and severally liable to the ITER Organization.

In order for a consortium to be acceptable, the individual legal entities included therein shall have nominated a leader with authority to bind each member of the consortium, and this leader shall be authorised to incur liabilities and receive instructions for and on behalf of each member of the consortium.

It is expected that the designated consortium leader will explain the composition of the consortium members in its offer. Following this, the Candidate's composition must not be modified without notifying the ITER Organization of any changes. Evidence of any such authorisation shall be submitted to the IO in due course in the form of a power of attorney signed by legally authorised signatories of all the consortium members.

Any consortium member shall be registered in IPROC.

9 Sub-contracting Rules

No subcontracting is allowed for this package.

Technical Specifications (In-Cash Procurement)**Technical Specifications for SOLPS-ITER matrix solver
numerical improvement contract**

This document contains the technical specifications for a contract aimed at improving the numerical robustness of the matrix solver used to compute plasma fluid transport inside the B2.5 component of the SOLPS-ITER code suite.

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1 Preamble

This Technical Specification is to be read in combination with the General Management Specification for Service and Supply (GM3S) – [Ref 1] that constitutes a full part of the technical requirements.

In case of conflict, the content of the Technical Specification supersedes the content of Ref [1].

2 Purpose

The design of the ITER divertor and estimates of the required fuelling throughput for safe operation have relied for many years on simulations performed by use of the SOLPS plasma edge modeling tool. In 2014, a new version of this code package was adopted, named SOLPS-ITER [2]. The SOLPS-ITER suite contains the B2.5 code as its main solver for the plasma transport, and uses the EIRENE code as its main workhorse for solving the transport equations related to neutral atomic and molecular species, as well as for radicals and molecular ions. In 2022, the code was significantly expanded with a Wide Grids capability, moving to an unstructured (though still field-aligned) geometry description [3]. More recently, the code was migrated to a GitHub distribution and made available as open-source software for the fusion community at large.

The scope of the present contract is to improve the robustness of the matrix solver methods used in the B2.5 fluid plasma transport component of the SOLPS-ITER code to handle non-orthogonal grids, particularly those found in converted cases from older SOLPS versions that used structured grids. These structured grids often needed to be strongly distorted near the target plates, to try and simultaneously satisfy the requirements of field alignment, target shape matching, and a rectangular computational domain. Running the Wide Grids SOLPS-ITER version on a case with such a (narrow) grid, including those from the ITER divertor design database, quickly leads to crashes. These crashes are often triggered by densities dropping to zero in very elongated grid cells and make the older cases unusable with the Wide Grids code version. The inability to run such legacy cases is an obstacle in the IO's long-term goal to make the Wide Grids SOLPS-ITER code version the reference code version and to no longer need to maintain both structured and unstructured code versions.

Several schemes exist in the literature of numerical algorithms designed to avoid such issues, for example slope limiters [4]. The aim of the contract is thus to evaluate such schemes in the B2.5 Wide Grids context and implement the most promising solution. The measure of success in any new scheme implementation will be the ability to re-converge representative cases from the ITER divertor design database and demonstrate accuracy of the numerical results by benchmarking them against reference structured SOLPS-ITER run output.

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3 Acronyms & Definitions

3.1 Acronyms

The following acronyms are the main ones relevant to this document.

Abbreviation	Description
AD	Algorithmic Differentiation
CI	Continuous Integration
CRO	Contract Responsible Officer
GM3S	General Management Specification for Service and Supply
IO	ITER Organization
KOM	Kick-Off Meeting
PRO	Procurement Responsible Officer
SDCC	Scientific Data and Computing Cluster
SOLPS	Scrape-Off Layer Plasma Simulator
TRO	Technical Responsible Officer

3.2 Definitions

Contractor: shall mean an economic operator who have signed the Contract in which this document is referenced.

Kick-Off Meeting: initial meeting between Contractor and TRO that will mark the beginning of the Contract timeline.

Technical Responsible Officer: shall mean the IO staff member(s) in charge of monitoring the Contract progress and the point of contact for the Contractor regarding all technical matters

4 Applicable Documents & Codes and standards

4.1 Applicable Documents

It is the responsibility of the Contractor to identify and request any documents that would not have been transmitted by IO, including the below list of reference documents.

This Technical Specification takes precedence over the referenced documents. In case of conflicting information, it is the responsibility of the contractor to seek clarification from IO.

Upon notification of any revision of the applicable documents transmitted officially to the Contractor, the Contractor shall advise within 4 weeks of any impact on the execution of the contract. Without any response after this period, no impact will be considered.

Ref	Title	IDM Doc ID	Version
1	General Management Specification for Service and Supply (GM3S)	82MXQK	1.4

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2	X. Bonnin <i>et al.</i> , Plasma Fus. Res. 11 (2016) 1403102		
3	W. Dekeyser <i>et al.</i> , NME 27 (2021) 100999		
4	P. Sharma <i>et al.</i> , J. Comp. Phys. 227 (2007) 123		

4.2 Applicable Codes and Standards

It is the responsibility of the contractor to procure the relevant Codes and Standards applicable to that scope of work.

Ref	Title	Doc Ref.	Version
CS1	SOLPS-ITER CONTRIBUTING rules		3.2.1

5 Scope of Work

This section defines the specific scope of work for the service, in addition to the contract execution requirements as defined in Ref [1].

5.1 Scope of work

The work envisioned in this Contract aims at providing a more robust solution method for the fluid plasma transport equations used in the B2.5 Wide Grids unstructured 3.2.1 code version, in the context of the SOLPS-ITER code suite with the same version number. As such it will need to demonstrate the ability to provide accurate and well-converged solutions, in a reasonable amount of CPU time (roughly the same as current B2.5 execution), for cases currently known to crash with the current solver implementation.

The demonstration of the new capability will be performed upon the set of cases from the stored examples that are part of the structured SOLPS-ITER code distribution, and available as Zenodo records at <https://zenodo.org/communities/solps/>. From these demonstrations cases, a new set of example cases for the unstructured code version will be built, along with a relevant set of CI test scripts making use of them, at least covering the same ground as the existing structured code CI tests, and, in addition, some tests aimed at ensuring that the new scheme remains accurate, by means of comparisons against known analytic solutions or using the MMS method. The material for these new CI tests will be stored as a new SOLPS-ITER Zenodo record alongside the existing ones.

In order to minimize the impact of the Contractor's work on other B2.5 or SOLPS-ITER developments, the work should be performed within dedicated branches on the *iterorganization* GitHub repositories (<https://github.com/iterorganization>), which will have to be kept current with any code updates arising from other SOLPS-ITER project contributors. Backward-compatibility shall be maintained, i.e. existing Wide Grids cases must be able to be continued without change if the old solver numerics are being used. To this end, any new numerical treatment options should have some switch governing their usage, although it may be decided by the TRO after sufficient testing to make the new treatment the default one used in future code runs.

The set of examples on which the new numerical method must be demonstrated is the one found in the *master* branch of the SOLPS-ITER repository, in the *\$SOLPSTOP/runs/examples* directory, namely:

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- *test_slab_ortho_standalone*: An orthogonal slab test case for **B2.5** standalone;
- *AUG_16151_D*: ASDEX-Upgrade D-only benchmark cases, including **B2.5** standalone, coupled and single **Eirene** call run directories;
- *AUG_16151_D+C+He*: ASDEX-Upgrade multi-fluid benchmark cases, including **B2.5** standalone, coupled and single **Eirene** call run directories;
- *AUG_28903_D+N_drifts*: ASDEX-Upgrade D+N case including drifts;
- *AUG_28903_D+Ne_drifts*: ASDEX-Upgrade D+Ne case including drifts;
- *DIID_3106_DN_D+C*: DIID-D disconnected double-null case including Carbon chemical sputtering;
- *ITER_2171_D+He+Be+Ne*: ITER full performance case with Ne injection and Be sputtering;
- *ITER_2264_0.6Ne_100MW*: Another ITER full performance case with Ne injection;
- *ITER_2275_Only_20MW*: ITER low power case at low density (D-fuelled);
- *ITER_2292_Only_20MW*: ITER low power case at low density (H-fuelled);
- *ITER_2294_Only_20MW*: Same as above, but increasing density;
- *ITER_2296_Only_20MW*: Same as above, but continuing density scan;
- *ITER_2297_Only_20MW*: Same as above, continuing scan;
- *ITER_2298_Only_20MW*: Same as above, continuing scan;
- *ITER_2299_Only_20MW*: Same as above, continuing scan, reaching detachment;
- *ITER_2308_Only_20MW*: Same as above, continuing scan, detached conditions;
- *ITER_2360_0.95He+0.05H_40MW*: ITER Helium plasma case at mid-power (also contains an example with metastable-resolved Helium neutrals);
- *ITER_2588_drifts*: ITER **B2.5** standalone D-only demonstration case with and without drifts;
- *ITER_535_D+He+Ar*: ITER full power case with Ar injection;
- *ITER_Be-W_D+T+He+Ne*: ITER full power case with 98 species;
- *JTEXT_Limiter_H*: J-TEXT limiter case (H-only, full drifts);
- *MAST_U_SFminus_Only*: Lower snowflake-minus case at low power with D-only.

5.2 Description

The sequence of tasks envisioned for this contract is as follows:

1. As a first deliverable, the Contractor will perform a literature search about solution methods for finite-volume fluid solvers such as the one used by B2.5, with an emphasis on numerical robustness and stability, and propose implementation of one of more of these methods in the existing code base. A report about this activity is to be provided to the IO six (6) weeks after the start of the Contract work.
2. Choice of the numerical method(s) to implement, to be made at a dedicated meeting between the Contractor and the TRO within 2 weeks after receipt of the first deliverable report. The selection will be based on the following criteria (in no particular order):
 - a. Public availability of the needed software
 - b. Portability of the software across compilers and platforms
 - c. Compatibility with OpenMP and MPI parallelization schemes
 - d. Adherence to Fortran 2003 standards
 - e. Ease of implementation and integration into the existing B2.5 data structures
 - f. Existing numerical accuracy and robustness literature

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3. Implementation of the new numerics methods, in a backward-compatible fashion, with demonstration of accuracy and convergence properties against known analytical solutions and/or using MMS tools.
4. Modify the conversion workflow taking legacy results obtained with the structured code to new starting points using the unstructured code, but still able to use the original grids.
5. Demonstrate convergence of the ITER legacy examples with the new numerical method and rebuild the full library of them.
6. Demonstrate convergence of the examples for slab, limiter, DN, and snowflake topologies and rebuild them.
7. Publish a new Zenodo record with all the updated examples.
8. Modify the CI test scripts to use the updated Zenodo record and include an analytic or MMS test of the solution method.

5.3 Service Duration

The maximum expected duration for this activity is 6 months. See Section 8 for the Deliverables schedule.

6 Location for Scope of Work Execution

The work envisioned in this contract is expected to be done on the Contractor's premises.

Code development is to be performed on a fork from the SOLPS-ITER and B2.5 GitHub repositories (<https://github.com/iterorganization/SOLPS-ITER> and <https://github.com/iterorganization/B2.5>, respectively). These forks should be based at the tip of the respective *feature/wg-release* branches, and must be kept current throughout the contract period, in order to catch any potential conflicts as soon as they arise.

B2.5 and SOLPS-ITER runs may be performed either on the Contractor's own computer infrastructure or on the SDCC cluster at ITER.

7 IO Documents

Under this scope of work, IO will deliver the following documents by the stated date:

Ref	Title	Doc ID	Expected date
1	Provide access to <i>iterorganization</i> GitHub domain with "Write" permissions on SOLPS-ITER and B2.5 repositories		T0 + 2 weeks
2	Provide Contractor with an SDCC cluster account to run B2.5 and SOLPS-ITER cases at ITER		T0 + 2 weeks

8 List of deliverables and due dates

The Supplier shall provide IO with the documents and data required in the application of this technical specification, the GM3S Ref [1] and any other requirement derived from the application of the contract.

A minimum, but not limited to, list of documents is available hereafter with associated due dates:

SERVICE

Technical Design Family (TDF)	Generic Document Title (GTD)	Further Description	Expected date (T0 + x) *
Review or Decision or Recommendations Report	Progress Report	Literature search and applicability analysis of available numerical methods	T0 + 6 weeks
Commissioning Record or Report	Software Test Report	Final report showing implementation results	T0 + 6 months

(*) T0 = Commencement Date of the contract (KOM); X in months.

The T0 start of the Contract will coincide with the date of the Kick-Off Meeting. The KOM may be held remotely via videoconference.

The software prepared by the Contractor is to be delivered in the form of Pull Requests on the relevant GitHub repositories and the delivery will only be considered complete once these Pull Requests pass all required CI tests and are merged by the TRO. The Contractor is urged to make these Pull Requests as atomic and focussed as possible to simplify and speed up the code review by the TRO. The TRO may invite external reviewers to examine the Pull Requests if it is felt that they would have relevant expertise or tests cases with which to challenge the proposed code.

The Pull Requests will be done within the *iterorganization* GitHub domain, so that the IO CI server can immediately take notice of them and run the standard set of CI test cases which are already in use for the SOLPS-ITER Wide Grids code version. These CI tests must be passed before a Pull Request will be considered for merging into the main development branches.

Since an expansion of the list of CI test cases is an integral part of this Contract, the Contractor must also deliver updates to the CI test scripts that add the new CI test cases to be considered, which must, as a minimum, contain several of the cases from the structured SOLPS-ITER code CI test case database. These new cases should be delivered as a Zenodo record, in a manner compatible with the current CI workflow, at <https://zenodo.org/communities/solps/>. The final version of the Wide Grids code version CI test scripts, provided by the Contractor by the end of the Contract, should cover at least the same ground as already done for the structured code version, namely **B2.5** standalone and coupled **B2.5-Eirene** code operation; check for restart effects; serial, debug, MPI-, and OpenMP-parallelized operation; single- and multi-fluid runs; and single- and double-null topologies, in addition to the AD code tests already performed for the Wide Grids code version. The current CI scripts can be found in the *\$SOLPSTOP/scripts* directory. An AD version of the code delivered by the Contractor is not required, unless the Contractor has access to a Tapenade® licence (not provided by the IO) and can build the differentiated code (tangent, adjoint, and Hessian variants) using their own infrastructure.

The Supplier is requested to prepare their document schedule based on the above and using the template available in the GM3S Ref [1] appendix II ([click here to download](#)).

9 Quality Assurance requirements

The Quality class under this contract is QC4, [Ref 1] GM3S section 8 applies in line with the defined Quality Class.

10 Safety requirements

No specific safety requirement related to PIC and/or PIA and/or PE/NPE components apply.

SERVICE

11 Special Management requirements

Requirement for [Ref 1] GM3S section 6 applies in full.

12 Appendices

None

Expression of Interest

To be returned by e-mail to cecile.mendoza_ext@iter.org (copy jongeun.lee@iter.org)
before 15 July 2026, 17.00 CET

ITER Organization / ITER Headquarters
Procurement Division
Route de Vinon-sur-Verdon
CS 90 046
13067 St. Paul Lez Durance Cedex
France

TENDER No. **IO/26/CFE/10035182/cma**

TENDER Title: **SOLPS-ITER matrix solver numerical improvement contract**

Officer in charge: **Cécile Mendoza – EXT - Procurement Division, ITER Organization**

☐ We acknowledge receipt of all tender documents for the above-mentioned tender.
(In event of missing documents, contact the ITER Officer in charge)

☐ We intend to submit a tender

Contact Person for this solicitation Process:

Name: Tel:

Position: E-mail address:

Signatory Name:

Company Stamp

Title:

Signature:

Date: