

REQUEST FOR PROPOSAL UNESCO Institute for Statistics Drupal Website Updates

Ref: RFP Drupal Website Updates

(Please quote this UNESCO reference in all correspondence)

Date 30 07 2018

Dear Sir/Madam,

You are invited to submit an offer for RFP Drupal Website Updates in accordance with the present solicitation document.

The Request for Proposal (RFP) consists of this cover page and the following Annexes:

Annex I Instructions to Offerors
Annex II General Conditions of Contract
Annex IV Proposal Submission Form
Annex V Price Schedule Form
Vendor Information Form

Your offer comprising of technical proposal and financial proposal, in two separate emails should reach the email address uis.procurement@unesco.org no later than 17:00 EST 20 August 2018.

- 1- Identify your Technical Proposal with subject line: RFP Drupal Website Updates Technical
- 2- Identify your Pricing Proposal with subject line: RFP Drupal Website Updates Pricing

This letter is not to be construed in any way as an offer to contract with your firm/institution. Your proposal could, however, form the basis for a contract between your company and the UNESCO Institute for Statistics.

You are requested to acknowledge the receipt of this letter and to indicate whether or not you will be submitting a proposal. For this purpose, and for any requests for clarification, please contact Brian Buffett at the UNESCO Institute for Statistics at (b.buffett@unesco.org).

For and on behalf of the UNESCO Institute for Statistics Silvia Montoya, Director UIS

ANNEX I - Instructions to Offerors

These instructions contain general guidelines and instructions on the preparation, clarification, and submission of Proposals.

A. INTRODUCTION

1. General

The purpose of this Request for Proposal (RFP) is to invite Sealed Proposals for professional services to be provided to the UNESCO Institute for Statistics (UIS).

2. Eligible bidders

Bidders should not be associated, or have been associated in the past, directly or indirectly, with a firm or any of its affiliates which have been engaged by UIS to provide consulting services for the preparation of the Terms of Reference, and other documents to be used for the procurement of services to be purchased under this Request for Proposal.

This bid is open to all national and international suppliers who are legally constituted, can provide the requested services.

Bidders are ineligible if at the time of submission of the offer:

- (a) The bidder is on the exclusion list published on the global portal for suppliers of the United Nations Organization, (http://www.ungm.org) due to fraudulent activities.
- (b) The name of the bidder appears on the Consolidated United Nations Security Council Sanctions List which includes all individuals and entities subject to sanctions measures imposed by the Security Council.
- (c)The bidder is excluded by the World Bank Group.

3. Fraud and corruption

UIS requires that bidders, contractors and their subcontractors adhere to the highest standard of moral and ethical conduct during the procurement and execution of UIS contracts and do not engage in corrupt, fraudulent, collusive, coercive or obstructive practices.

For the purpose of this provision such practices are collectively referred to as "fraud and corruption":

- "Corrupt practice" is the offering, giving, receiving or soliciting, directly or indirectly, an
 undue advantage, in order that the person receiving the advantage, or a third person, act or
 refrain from acting in the exercise of their official duties, or abuse their real or supposed
 influence;
- "Fraudulent practice" is a knowing misrepresentation of the truth or concealment of a
 material fact aiming at misleading another party in view of obtaining a financial or other
 benefit or avoiding an obligation, or in view of having another party act to their detriment;
- "Collusive practice" means an arrangement between two or more parties designed to achieve an improper purpose, including influencing improperly the actions of another party;
- "Coercive practice" means impairing or harming, or threatening to impair or harm, directly or indirectly, any party or the property of the party to influence improperly the actions of a party.
- "Obstructive practice" means acts intended to materially impede the exercise of UIS's contractual rights of audit, investigation and access to information, including destruction,

- 2 - Revised: June 2017 BFM/FPC

- falsification, alteration or concealment of evidence material to a UIS investigation into allegations of fraud and corruption.
- "Unethical practice" means conduct or behaviour that is contrary to Staff or Supplier codes of conduct, such as those relating to conflict of interest, gifts, hospitality, postemployment provisions, abuse of authority and harassment.

UIS expects that all suppliers who wish to do business with UIS will embrace the <u>United Nations</u> Supplier Code of Conduct

UN Agencies have adopted a zero tolerance policy on gifts and therefore, it is of overriding importance that UIS staff should not be placed in a position where their actions may constitute or could be reasonably perceived as reflecting favourable treatment of an individual or entity by accepting offers of gifts, hospitality or other similar favours. Vendors are therefore requested not to send or offer gifts or hospitality to UIS personnel.

UIS will:

- Reject a proposal to award a contract if it determines that a vendor recommended for award has engaged in fraud and corruption in competing for the contract in question.
- Cancel or terminate a contract if it determines that a vendor has engaged in fraud and corruption in competing for or in executing a UIS contract.
- Declare a vendor ineligible, either indefinitely or for a stated period of time, to become a UN
 registered vendor if it at any time determines that the vendor has engaged in fraud and
 corruption in competing for or in executing a UIS contract.

Any concern or evidence that corruption or fraud may have occurred or is occurring related to a UIS contract shall be forwarded to the Office of Internal Oversight. Please refer to how-to-report-fraud-corruption-or-abuse.

4. Cost of Proposal

The Offeror shall bear all costs associated with the preparation and submission of the Proposal and UIS will in no case be responsible or liable for those costs, regardless of the conduct or outcome of the solicitation.

B. SOLICITATION DOCUMENTS

5. Contents of Solicitation Documents

Proposals must offer services for the total requirement. Proposals offering only part of the requirement will be rejected. The Offeror is expected to examine all corresponding instructions, forms, terms and specifications contained in the Solicitation Documents. Failure to comply with these documents will be at the Offeror's risk and may affect the evaluation of the Proposal.

6. Clarification of Solicitation Documents

A prospective Offeror requiring any clarification of the Solicitation Documents may notify UIS in writing at the organisation's email number indicated in the RFP. UIS will respond in writing to any request for clarification of the Solicitation Documents that it receives earlier than two weeks prior to the deadline for the submission of Proposals. Written copies of the organisation's response (including an explanation of the query but without identifying the source of inquiry) may be sent to all prospective Offerors that have received the Solicitation Documents.

7. Amendments of Solicitation Documents

At any time prior to the deadline for submission of Proposals, UIS may, for any reason, whether at its own initiative or in response to a clarification requested by a prospective Offeror, modify the Solicitation Documents by amendment.

All prospective Offerors that have received the Solicitation Documents will be notified in writing of all amendments to the Solicitation Documents.

In order to afford prospective Offerors reasonable time in which to take the amendments into account in preparing their offers, UIS may, at its discretion, extend the deadline for the submission of Proposals.

C. PREPARATION OF PROPOSALS

The offers received must include information in sufficient scope and detail to allow UIS to consider whether the company has the necessary capability, experience, expertise, financial strength and the required capacity to perform the services satisfactorily.

8. Language of the Proposal

The Proposals prepared by the Offeror and all correspondence and documents relating to the Proposal exchanged by the Offeror and UIS shall be written in ENGLISH. Any printed literature furnished by the Offeror may be written in another language so long as accompanied by a translation of its pertinent passages in which case, for purposes of interpretation of the Proposal, the language as stated in the Solicitation Documents applies.

9. Documents Comprising the Proposal

The Proposal shall comprise the following components:

- a) Proposal submission form;
- Operational and technical part of the Proposal, including documentation to demonstrate that the Offeror meets all requirements;
- c) Price schedule, completed in accordance with clauses 10 &11;

10. Proposal Form - Presentation of the technical proposal

The Offeror shall structure the technical part of its Proposal as follows:

10.1. Description of the firm/institution and its qualifications

(a) Management Structure

This Section should provide corporate orientation to include company's profile (year and country of incorporation – copy of certificate of incorporation), a brief description of present activities focusing on services related to the Proposal as well as an outline of recent experience on similar projects, including experience in the country.

The firm/institution should describe the organizational unit(s) that will become responsible for the contract, and the general management approach towards a project of this kind. The Offeror should identify the person(s) representing the Offeror in any future dealing with UIS.

Offeror to provide supporting information as to firm's technical reliability, financial and managerial capacity to perform the services.

(b) Resource Plan

This Section should fully explain the Offeror's resources in terms of personnel and facilities necessary for the performance of the requirements, and any plans for their expansion. It should describe Offeror's current capabilities/facilities and any plans for their expansion.

10.2. Proposed Approach, Methodology, Timing and Outputs

This section should demonstrate the Offeror's responsiveness to the TOR and include detailed description of the manner in which the firm/institution would respond to the TOR, addressing the requirements, as specified, point by point. You should include the number of person-working days in each specialization that you consider necessary to carry out all work required.

For assessment of your understanding of the requirements please include any assumptions as well as comments on the data, support services and facilities to be provided by the beneficiary as indicated in the Statement of Requirements/TOR, or as you may otherwise believe to be necessary.

10.3. Proposed Personnel

In this section, the offeror should reflect the project staffing including the work tasks to be assigned to each staff member as well as their qualifications with reference to practical experience relating to specialization area of the project for each proposed staff. The complete CV's of proposed staff is to be submitted.

If applicable, this staffing proposal should be supported by an organigram illustrating the reporting lines, together with a description of such organization structure.

The technical part of the Proposal should not contain any pricing information whatsoever on the services offered. Pricing information shall be separated and only contained in the appropriate Price Schedule.

It is mandatory that the Offeror's Proposal numbering system corresponds with the numbering system as provided in the TOR. All references to descriptive material and brochures should be included in the respective paragraph, though material/documents themselves may be provided as annexes to the Proposal/response.

11. Price Proposal

The Offeror shall indicate on an appropriate Price Schedule, an example of which is contained in the Price Schedule sheet, the prices of services it proposes to supply under the contract, if selected.

12. Proposal currencies

Your separate price envelop must contain an overall quotation in a single currency. All prices shall be quoted in US dollars.

13. Period of validity of proposals

Proposals shall remain valid for ninety (90) days after the date of Proposal submission prescribed by UIS, pursuant to the deadline clause. A Proposal valid for a shorter period may be rejected by UIS on the grounds that it is non-responsive.

14. Payment

In full consideration for the complete and satisfactory performance of the services of the contract, UIS shall effect payments to the Contractor within 30 days after receipt and acceptance of the invoices submitted by the contractor for services provided.

D. SUBMISSION AND DEADLINE OF PROPOSALS

15. Sealing and marking of proposals

Your offer comprising of technical proposal and pricing proposal, in **two separate emails** should reach the email address <u>uis.procurement@unesco.org</u> **no later than 17:00 EST 20 August 2018**.

I- Identify your Technical Proposal with subject line: UIS Drupal Website Updates - Technical

II- Identify your Pricing Proposal with subject line: UIS Drupal Website Updates - Pricing

Proposals must be received on or before the date and time specified on the cover page of these Solicitation Documents.

UIS may, at its own discretion extend this deadline for the submission of Proposals by amending the solicitation documents in accordance with clause *Amendments of Solicitation Documents*.

16. Late Proposals

Any Proposal received by UIS after the deadline for submission of proposals, pursuant to clause *Deadline for the submission of proposals*, will be rejected.

17. Modification and withdrawal of Proposals

The Offeror may withdraw its Proposal after the Proposal's submission, provided that written notice of the withdrawal is received by UIS prior to the deadline specified in the RFP. Proposals may not be modified or withdrawn after that time.

E. OPENING AND EVALUATION OF PROPOSALS

18. Opening of proposals

UIS representatives will open all Proposals after the deadline for submissions and in accordance with the rules and regulations of the organization.

19. Clarification of proposals

To assist in the examination, evaluation and comparison of Proposals, UIS may at its discretion, ask the Offeror for clarification of its Proposal. The request for clarification and the response shall be in writing and no change in price or substance of the Proposal shall be sought, offered or permitted.

20. Preliminary examination

UIS will examine the Proposals to determine whether they are complete, whether any computational errors have been made, whether the documents have been properly signed, and whether the Proposals are generally in order.

Prior to the detailed evaluation, UIS will determine the substantial responsiveness of each Proposal to the Request for Proposals (RFP). For purposes of these Clauses, a substantially responsive Proposal is one, which conforms to all the terms and conditions of the RFP without material deviations. The determination of a Proposal's responsiveness is based on the contents of the Proposal itself without recourse to extrinsic evidence.

A Proposal determined as not substantially responsive will be rejected by UIS.

21. Evaluation and comparison of proposals

A two-stage procedure will be used in evaluating the proposals, with evaluation of the technical component being completed prior to any price component being opened and compared. The Price Component will be opened only for submissions that passed the minimum score of 70 % of the total points obtainable for the technical evaluation.

The technical proposal is evaluated on the basis of its responsiveness to the Terms of Reference (TOR).

LOWEST PRICE OF TECHNICALLY RESPONSIVE PROPOSALS

The price proposal of all offerors, who have attained minimum 70 % score in the technical evaluation, will be compared. *The contract will be awarded to the firm/institution offering the lowest price*.

Technical evaluation criteria:

		Points	Name of Firm / Institution		
Sam	Sample: Summary of Technical Proposal Evaluation Forms		Α	В	С
1.	Expertise of Firm / Institution submitting Proposal	300			
2.	Proposed Work Plan and Approach	500			
3.	Personnel	200			
	Total	1000			

F. AWARD OF CONTRACT

22. Award criteria, award of contract

UIS reserves the right to accept or reject any Proposal, and to annul the solicitation process and reject all Proposals at any time prior to award of contract, without thereby incurring any liability to the affected Offeror or any obligation to inform the affected Offeror or Offerors of the grounds for such action.

Prior to expiration of the period of proposal validity, UIS will award the contract to the qualified Offeror whose Proposal after being evaluated is considered to be the most responsive to the needs of the organisation and activity concerned.

23. Purchaser's right to vary requirements at time of award and to negotiate

UIS reserves the right at the time of award of contract to increase or decrease by up to 20% the quantity of services and goods specified in the RFP without any change in hourly/daily or any other rates or prices proposed by the Bidders or other terms and conditions.

UIS reserves the right to undertake further negotiations on the proposed offer.

ANNEX II - General Terms and Conditions for Professional Services

1. LEGAL STATUS

The Contractor shall be considered as having the legal status of an independent contractor vis-à-vis UNESCO. The Contractor's personnel and sub-contractors shall not be considered in any respect as being the employees or agents of UNESCO.

2. SOURCE OF INSTRUCTIONS

The Contractor shall neither seek nor accept instructions from any authority external to UNESCO in connection with the performance of its services under this Contract. The Contractor shall refrain from any action, which may adversely affect UNESCO or the United Nations and shall fulfill its commitments with the fullest regard to the interests of INESCO.

3. CONTRACTOR'S RESPONSIBILITY FOR EMPLOYEES

The Contractor shall be responsible for the professional and technical competence of its employees and will select, for work under this Contract, reliable individuals who will perform effectively in the implementation of this Contract, respect the local customs, and conform to a high standard of moral and ethical conduct.

4. ASSIGNMENT

The Contractor shall not assign, transfer, pledge or make other disposition of this Contract or any part thereof, or any of the Contractor's rights, claims or obligations under this Contract except with the prior written consent of UNESCO.

5. SUB-CONTRACTING

In the event the Contractor requires the services of sub-contractors, the Contractor shall obtain the prior written approval and clearance of UNESCO for all sub-contractors. The approval of UNESCO of a sub-contractor shall not relieve the Contractor of any of its obligations under this Contract. The terms of any sub-contract shall be subject to and conform with the provisions of this Contract.

6. OFFICIALS NOT TO BENEFIT

The Contractor warrants that no official of UNESCO has received or will be offered by the Contractor any direct or indirect benefit arising from this Contract or the award thereof. The Contractor agrees that breach of this provision is a breach of an essential term of this Contract.

7. INDEMNIFICATION

The Contractor shall indemnify, hold and save harmless, and defend, at its own expense, UNESCO, its officials, agents, and employees from and against all suits, claims, demands, and liability of any nature or kind, including their costs and expenses, arising out of acts or omissions of the Contractor, or the Contractor's employees, officers, agents or sub-contractors, in the performance of this Contract. This provision shall extend, inter-alia, to claims and liability in the nature of workmen's compensation, products liability and liability arising out of the use of patented inventions or devices, copyrighted material or other intellectual property by the Contractor, its employees, officers, agents, servants or sub-contractors. The obligations under this Article do not lapse upon termination of this Contract.

8. INSURANCE AND LIABILITIES TO THIRD PARTIES

The Contractor shall provide and thereafter maintain insurance against all risks in respect of its property and any equipment used for the execution of this Contract. The Contractor shall provide and thereafter maintain all appropriate workmen's compensation insurance, or its equivalent, with respect to its employees to cover claims for personal injury or death in connection with this Contract. The Contractor shall also provide and thereafter maintain liability insurance in an adequate amount to cover third party claims for death or bodily injury, or loss of or damage to property, arising from or in connection with the provision of services under this Contract or the operation of any vehicles, The Contractor shall provide and thereafter maintain all appropriate workmen's compensation insurance, or its equivalent, with respect to its employees to cover claims for personal injury or death in connection with this Contract or the operation of any vehicles, boats, airplanes or other equipment owned or leased by the Contractor or its agents, servants, employees or sub-contractors performing work or services in connection with this Contract. Except for the workmen's compensation insurance, the insurance policies under this Article shall:

8.1 Name UNESCO as additional insured:

8.2 Include a waiver of subrogation of the Contractor's rights to the insurance carrier against UNESCO;

8.3 Provide that UNESCO shall receive thirty (30) days written notice from the insurers prior to any cancellation or change of coverage8.4 The Contractor shall, upon request, provide UNESCO with satisfactory evidence of the insurance required under this Article.

9. ENCUMBRANCES/LIENS

The Contractor shall not cause or permit any lien, attachment or other encumbrance by any person to be placed on file or to remain on file in any public office or on file with UNESCO against any monies due or to become due for any work done or materials furnished under this Contract, or by reason of any other claim or demand against the Contractor.

10. TITLE TO EQUIPMENT

Title to any equipment and supplies that may be furnished by UNESCO shall rest with UNESCO and any such equipment shall be returned to UNESCO at the conclusion of this Contract or when no longer needed by the Contractor. Such equipment, when returned to UNESCO, shall be in the same condition as when delivered to the Contractor, subject to normal wear and tear. The Contractor shall be liable to compensate UNESCO for equipment determined to be damaged or degraded beyond normal wear and tear.

11. COPYRIGHT, PATENTS AND OTHER PROPRIETARY RIGHTS

UNESCO shall be entitled to all intellectual property and other proprietary rights including but not limited to patents, copyrights, and trademarks, with regard to products, or documents and other materials which bear a direct relation to or are produced or prepared or collected in consequence of or in the course of the execution of this Contract. At UNESCO's request, the Contractor shall take all necessary steps, execute all necessary documents and generally assist in securing such proprietary rights and transferring them to UNESCO in compliance with the requirements of the applicable law

12. USE OF NAME, EMBLEM OR OFFICIAL SEAL OF UNESCO OR THE UN

The Contractor shall not advertise or otherwise make public the fact that it is a Contractor with UNESCO, nor shall the Contractor, in any manner whatsoever use the name, emblem or official seal of UNESCO, or any abbreviation of the name of UNESCO in connection with its business or otherwise

13. CONFIDENTIAL NATURE OF DOCUMENTS AND INFORMATION

Drawings, photographs, plans, reports, recommendations, estimates, documents and all other data compiled by or received by the Contractor under this Contract shall be the property of UNESCO, shall be treated as confidential and shall be delivered only to UNESCO authorized officials on completion of work under this Contract. The Contractor may not communicate at any time to any other person, Government or authority external to UNESCO, any information known to it by reason of its association with UNESCO, which has not been made public except with the authorization of UNESCO; nor shall the Contractor at any time use such information to private advantage. These obligations do not lapse upon termination of this Contract.

14. FORCE MAJEURE; OTHER CHANGES IN CONDITIONS

Force majeure, as used in this Article, means acts of God, war (whether declared or not), invasion, revolution, insurrection, or other acts of a similar nature or force, which are beyond the control of the Parties. In the event of and as soon as possible after the occurrence of any cause constituting force majeure, the Contractor shall give notice and full particulars in writing to UNESCO, of such occurrence or change if the Contractor is thereby rendered unable, wholly or in part, to perform its obligations and meet its responsibilities under this Contract. The Contractor shall also notify UNESCO of any other changes in conditions or the occurrence of any event, which interferes or threatens to interfere with its performance of this Contract. The notice shall include steps proposed by the Contractor to be taken including any reasonable alternative means for performance that is not prevented by force majeure. On receipt of the notice required under this Article, UNESCO shall take such action as, in its sole discretion, it considers to be appropriate or necessary in the circumstances, including the granting to the Contractor of a reasonable extension of time in which to perform its obligations under this Contract. If the Contractor is rendered permanently unable, wholly, or in part, by reason of force majeure to perform its obligations and meet its responsibilities under this Contract, UNESCO shall have the right to suspend or terminate this Contract on the same terms and conditions as are provided for in Article 15, "Termination", except that the period of notice shall be seven (7) days instead of thirty (30) days.

15. TERMINATION

Either party may terminate this Contract for cause, in whole or in part, upon thirty days notice, in writing, to the other party. The initiation of arbitral proceedings in accordance with Article 16 "Settlement of Disputes" below shall not be deemed a termination of this Contract. UNESCO reserves the right to terminate without cause this Contract at any time upon 15 days prior written notice to the Contractor, in which case UNESCO shall reimburse the Contractor for all reasonable costs incurred by the Contractor prior to receipt of the notice of termination. In the event of any termination by UNESCO under this Article, no payment shall be due from UNESCO to the Contractor except for work and services satisfactorily performed in conformity with the express terms of this Contract. The Contractor shall take immediate steps to terminate the work and services in a prompt and orderly manner and to minimize losses and further expenditures. Should the Contractor be adjudged bankrupt, or be liquidated or become insolvent, or should the Contractor make an assignment for the benefit of its creditors, or should a Receiver be appointed on account of the insolvency of the Contractor, UNESCO may, without prejudice to any other right or remedy it may have, terminate this Contract forthwith. The Contractor shall immediately inform UNESCO of the occurrence of any of the above events.

16. SETTLEMENT OF DISPUTES

16.1 Amicable Settlement

The Parties shall use their best efforts to settle amicably any dispute, controversy or claim arising out of, or relating to this Contract or the breach, termination or invalidity thereof. Where the parties wish to seek such an amicable settlement through conciliation, the conciliation shall take place in accordance with the UNCITRAL Conciliation Rules then obtaining, or according to such other procedure as may be agreed between the parties.

16.2 Arbitration

Unless, any such dispute, controversy or claim between the Parties arising out of or relating to this Contract or the breach, termination or invalidity thereof is settled amicably under the preceding paragraph of this Article within sixty (60) days after receipt by one Party of the other Party's request for such amicable settlement, such dispute, controversy or claim shall be referred by either Party to arbitration in accordance with the UNCITRAL Arbitration Rules then obtaining, including its provisions on applicable law. The arbitral tribunal shall have no authority to award punitive damages. The Parties shall be bound by any arbitration award rendered as a result of such arbitration as the final adjudication of any such controversy, claim or dispute.

17. PRIVILEGES AND IMMUNITIES

Nothing in or relating to this Contract shall be deemed a waiver, express or implied, of any of the privileges and immunities of UNESCO.

18. TAX EXEMPTION

18.1 Section 7 of the Convention on the Privileges and Immunities of the United Nations provides, inter-alia, that UNESCO, is exempt from all direct taxes, except charges for public utility services, and is exempt from customs duties and charges of a similar nature in respect of articles imported or exported for its official use. In the event any governmental authority refuses to recognize the UNESCO exemption from such taxes, duties or charges, the Contractor shall immediately consult with UNESCO to determine a mutually acceptable procedure. 18.2 Accordingly, the Contractor authorizes UNESCO to deduct from the Contractor's invoice any amount representing such taxes, duties or charges, unless the Contractor has consulted with UNESCO before the payment thereof and UNESCO has, in each instance, specifically authorized the Contractor to pay such taxes, duties or charges under

19. CHILD LABOUR

and appropriately authorized.

The Contractor represents and warrants that neither it, nor any of its suppliers is engaged in any practice inconsistent with the rights set forth in the Convention on the Rights of the Child, including Article

protest. In that event, the Contractor shall provide UNESCO with written evidence that payment of such taxes, duties or charges has been made 32 thereof, which, inter-alia, requires that a child shall be protected from performing any work that is likely to be hazardous or to interfere with the child's education, or to be harmful to the child's health or physical mental, spiritual, moral or social development.

Any breach of this representation and warranty shall entitle UNESCO to terminate this Contract immediately upon notice to the Contractor, at no cost to UNESCO.

20. MINES

20.1 The Contractor represents and warrants that neither it nor any of its suppliers is actively and directly engaged in patent activities, development, assembly, production, trade or manufacture of mines or in such activities in respect of components primarily utilized in the manufacture of Mines. The term "Mines" means those devices defined in Article 2, Paragraphs 1, 4 and 5 of Protocol II annexed to the Convention on Prohibitions and Restrictions on the Use of Certain Conventional Weapons Which May Be Deemed to Be Excessively Injurious or to Have Indiscriminate Effects of 1980

20.2 Any breach of this representation and warranty shall entitle UNESCO to terminate this Contract immediately upon notice to the Contractor, without any liability for termination charges or any other liability of any kind of UNESCO.

21. OBSERVANCE OF THE LAW

The Contractor shall comply with all laws, ordinances, rules, and regulations bearing upon the performance of its obligations under the terms of this Contract.

22. AUTHORITY TO MODIFY

No modification or change in this Contract, no waiver of any of its provisions or any additional contractual relationship of any kind with the Contractor shall be valid and enforceable against UNESCO unless provided by an amendment to this Contract signed by the authorized official of UNESCO.

23. SECURITY

The responsibility for the safety and security of the Contractor and its personnel and property, and of UNESCO property in the Contractor's custody, rests with the Contractor.

The Contractor shall:

(a) put in place an appropriate security plan and maintain the security plan, taking into account the security situation in the country where the services are being provided;

(b) assume all risks and liabilities related to the Contractor's security, and the full implementation of the security plan.

UNESCO reserves the right to verify whether such a plan is in place, and to suggest modifications to the plan when necessary. Failure to maintain and implement an appropriate security plan as required hereunder shall be deemed a breach of this contract. Notwithstanding the foregoing, the Contractor shall remain solely responsible for the security of its personnel and for UNESCO property in its custody.

24. ANTI-TERRORISM

The Contractor agrees to undertake all reasonable efforts to ensure that none of the UNESCO funds received under this Contract are used to provide support to individuals or entities subject to sanctions measures imposed by the Security Council and that the recipients of any amounts provided by UNESCO hereunder do not appear on the Consolidated United Nations Security Council Sanctions List, including the UN Security Council Resolution 1267 (1989). The list can be accessed via: https://www.un.org/sc/suborg/en/sanctions/un-sc-consolidated-list

This provision must be included in all sub-contracts or sub-agreements entered into under this Contract.



United Nations Educational, Scientific and Cultural Organization

Revised: June 2016 BFM/FPC

ANNEX III – Terms of Reference (TOR)

1.1 Background and Justification

The UNESCO Institute for Statistics (UIS) is the statistical branch of the United Nations Educational, Scientific and Cultural Organisation (UNESCO). The Institute produces the data and methodologies to monitor trends at national and international levels. It delivers comparative data for countries at all stages of development to provide a global perspective on education, science and technology, culture, and communication.

Based in Montreal (Canada), the UIS was established in 1999 with functional autonomy to meet the growing need for reliable and policy-relevant data. The Institute serves Member States, UNESCO and the UN system, as well as a range of intergovernmental and non-governmental organizations, research institutes and universities.

The UIS implemented and launched a new production website in December 2016. Post launch, change requests and new requirements have arisen and we are now aiming to integrate these requests in order to improve certain aspects of the site.

1.2 Objective

The objective of this contract is to modify the UIS Drupal website based on the requirements provided in these terms of reference (TOR). The modifications will include design changes, changes to content-types, changes to templates, changes to publishing workflows, changes to functionality, and non-functional changes.

The website is built using Drupal 7 WxT with Apache SOLR as the search engine. The site is hosted in MS Azure using IAAS resources. The production site may be viewed at this URL: www.uis.unesco.org

1.3 Outputs

An implemented UIS website and SOLR search solution which has been updated to include the feature requests and changes specified in this terms of reference and the annex of functional specifications. The implemented site will adhere to the criteria for success that has been identified and the annex of non-functional specifications. The Offeror is expected to demonstrate in their proposal how they intend to carry out the Design, Implementation, Training and Maintenance changes to the website system.

The proposal and project implementation should be by modular approach and implemented by delivery package:

Delivery Packages:

- 1) Delivery package (Release) #1:
 - a. Remove Indicators from website

2) Delivery package (Release) #2 - all other requirements as specified in this TOR and its Appendices

- ❖ Add new Content Types
- Change all Topic Pages (change template)
- Change Visualization Slider
- ❖ Add sliding carousel to top of website front page
- Change "Explore Themes" on front page to display all Education and Non-Education Themes in a single consolidated view
- Propose and implement redesign of Visualization Gallery
- Add Donate Button and create call-to-action page
- Apply patches and updates
- Review and modify Access Control rights
- Onboarding of new UIS Webmaster

See Appendix I for detailed functional specifications and Appendix II for non-functional specifications and standards.

1.4 Activities

Project Management (throughout the project)		
Activities	Responsible for guidance on best practice in terms of working methods, data management and ultimately the exact configuration of the solution.	
	 Responsible for Requirements Gathering and Scope Confirmation: Build on, clarify and detail functional requirements defined. Consolidate Requirements through document review and process owner approvals; 	
	 Responsible for ensuring that objectives are met on time. Responsible for providing methodology support and advise on key analysis issues 	
	Responsible for the development of all deliverables	
Deliverables	 Detailed functional and technical requirements (bearing in mind that whereas the TOR defines UIS specifications at a high level, it is the responsibility of the contractor to provide a detailed specification following their own fact-finding) Project Documentation (detailed schedule, Risk/Issue/Communication Strategies, Project Structure, Roles and responsibilities of team members) 	
	Detailed Project Delivery Plan	
Acceptance Criteria	Deliverables should be signed off by the UIS Project Sponsor	
Main Delivery Phase	Aain Delivery Phase	
Activities & Deliverables	General ❖ Timely status and delivery updates (frequency to be determined)	
	Scoping	
	❖ Deliver design documents	
	Conduct fact gathering sessions with UIS employees in order to properly analyse UIS needs and design appropriate solutions. Produce	

relevant meeting minutes and decision records. Design, implementation, development Configure, customize, design, develop, and deploy the Drupal and Apache SOLR solutions System customizing, development and testing should be iterative with frequent deliveries System configuration, customizing, development according to functional and technical requirements validated by UIS ❖ The UIS wishes to realise best value for money and thus reuse of existing modules and plug-ins is prioritized over custom development. The contractor is expected to present both options, with trade-offs and effort estimates, for proposed changes. Unit testing The supplier will be in charge of conducting unit testing Acceptance testing UIS should have around one week to conduct acceptance testing, by UIS will conduct testing following the completion of development and configuration and throughout the project ❖ The contractor shall participate in acceptance testing by delivering: A test plan A technical validation report in which results of each test can be recorded Training and Knowledge transfer deliverables UIS staff need to be trained in order to maintain the website. This will require functional and technical training for the following profiles: Content publishers Webmaster and software developers Support Provide software assurance and maintenance Provide ongoing support **Production deployment** Preparation of production environment with assistance from UIS staff Deliverables should be signed off by the UIS Project Sponsor Acceptance Criteria **Project Closure and Knowledge Transfer** Deliverables Hand-over documentation Deliver technical documentation and updated publisher/webmaster training manuals written specifically for UIS configuration Finalise knowledge transfer activities (training, go-live support, documentation, etc.) End of project report Acceptance Criteria Deliverables should be signed off by the UIS Project Sponsor

1.5 Inputs

- UIS will provide access to relevant documentation on the production implementation at the following location https://ldrv.ms/f/s!AiP4d2Ztl9v0iowQpOMv5DkPs9AleA
- ❖UIS will staff the project with functional and technical resources.
- UIS will provide Functional and Non-functional Requirements documents, however this does not exclude the responsibility of the Offeror to translate them into a blueprint document that can be used for the necessary customising;
- ❖UIS shall provide necessary accesses, office space and computer equipment (desks, computers, etc.) from 9:00 to 17:00.
- UIS shall provide a dedicated focal point to oversee the management of the project
- UIS will provide access to Drupal website and Azure environments (dev, test, staging, prod);
- UIS will provide access to VSTS environment and accounts for contractor staff. The contractor is expected to utilize VSTS for communicating the project plan and content of releases and features/epics; VSTS will also be used to report and manage all bugs/issues.
- UIS will provide access to UIS Basecamp environment for contractor staff. Basecamp will be used as the collaboration system for the project. Most written communications will take place using Basecamp; Decision records will be recorded in Basecamp; and documentation repository for the project will be in Basecamp.

1.6 Timing

Project activities are expected to start not more than 2 weeks after contract award and to be delivered by November 28, 2018.

The below project high-level schedule is proposed for the offerors to complete and include in the proposal as a minimum requirement. A full and detailed implementation plan would be preferable. Offerors may adapt the schedule, phases and milestones based on their preferred methodology.

The UIS expects the offeror to deliver the project in 2 releases, the first being not later than September 28th and the second not later than November 28th, 2018. The rationale for 2 releases is the fact that the UIS will be releasing a major update to its Education database on September 28th and it is imperative to remove the indicators in advance of the data release.

The website changes are to be launched according to 2 major milestones (releases):

- 1) By September 28, 2018, go-live of Delivery Package (Release) #1.
- 2) By November 28, 2018, go-live / completion of Delivery Package (Release) #2.

1.7 Reporting

The contractor would endeavour to keep UIS informed of progress in a sufficient, complete, appropriate and timely manner through the submission of reports, such as:

Bi weekly status reports,

- ❖ Exception reports, highlighting any deviations from the agreed project scope;
- ❖Issue and Risk Log;
- ❖ Final Report;
- Documentation, including knowledge training materials, both technical and functional.

1.8 Minimum Content of Proposals

The Proposal shall comprise the following components:

- ❖The submission form and signed informed the proposal (Annex IV)
- Operational and technical part of the Proposal, including all documentation to demonstrate that the Offeror meets all requirements; in addition of legal document attesting of Bidders general financial solidity and experience.
- Price Schedule Form (Annex V), completed in accordance with Annex-I, clauses 10 &11;
- ❖ Vendor Information Form (Annex VI)

Please note:

The Technical part of the Proposal should not contain any pricing information whatsoever on the services offered. Pricing information shall be **separated and only** contained in the appropriate Price Schedule.

1.9 Eligibility/qualification/experience requirements

UIS is seeking a comprehensive proposal from qualified firms for fulfilling these objectives as stated above.

Description of your firm's organizational capacity to deliver the Drupal Website tool (e.g. staff, equipment, software, physical space, office location, etc.);

1.9.1 Expertise of firm / institution submitting proposal

Firms are expected to demonstrative they have the capability to carry out this type of work.

- Company legal status: official document, demonstrating year of creation, legal status, should be provided (mandatory).
- Company detailed presentation, should show IT areas of expertise, main realizations with focus on Drupal: 3 years of experiences in Drupal should be proven (mandatory). Additional expertise in Apache SOLR, Microsoft Azure, would be an asset;
- ❖ Financial soundness: latest financial statements & turnover, covering the last 3 years, should be provided to demonstrate the financial solidity of the company (mandatory).
- Company's professional certifications (such as ISO norms, Professional Certifications, etc..) (preferable).
- Number of projects and assignments during the last 3 years with details of the the Names of Clients and other Partners involved (at least 3 projects (mandatory)).
- Reference of continuous/several assignments with institutional or large corporate companies (UN Organizations, International Organization or public sector) during the last 5 years (preferable and will be considered as asset).

❖ Bidders are required to submit at least three referenced projects, (3) Drupal implementations, that best reflect their work and relevance to this project (mandatory). Briefly list the role your firm played in each project and provide organization/company name, contact person's name, phone number and email address. UIS reserves the right to contact the person responsible of the Drupal for verification (mandatory). When commenting those reference examples, special attention must be paid to the quality of the submitted references to demonstrate how those references match the current assignment objectives and comment on key issues as well as show the expected expertise and quote names of the company staff involved.

1.9.2 Technical and Operational proposal (methodology, proposed workplan and approach)

This section should include the bidder's response to the TOR and consistent detailed descriptions of the manner in which the firm/institution, as specified, point by point would respond. It should include documentation demonstrating that the bidder meets all the specifications set out in the TOR and its Appendices.

The bidder should include the number of person-working days in each specialization that you consider necessary to carry out the work required.

For the assessment of your understanding of the requirements please include any assumptions as well as comments on the data, support services and facilities to be provided by UIS TOR, or as you may otherwise believe to be necessary.

- The company selected for this assignment is expected to have a clear and proven expertise in the areas of Drupal system. The selected experts should propose a clear global approach and methodology in their report and address all tasks detailed in the TOR and its Appendices.
- The requested deliverables, especially reports to be produced should show a clear understanding of the processes and services to be implemented. The quality of the submitted proposals, the approach and methodology presented are key in the selection process;
- ❖The selected bidder needs to provide information concerning its service level agreement (SLA) structure (describing response time, what is included or excluded from the SLA, conditions of service availability, responsibilities of each party, escalation procedures, measurement standards and methods, reporting process, contents and frequency, a dispute resolution process, and mechanism for updating the agreement if required). The SLA agreed between the parties will be part of the concluded contract and will be key elements of the project's progress and financial installment.

Note that if third party software or licences are needed to the implementation please include it in both technical and financial statement.

For evaluation purposes, UIS reserves the right to interview the Bidders whom their offers are found technically acceptable.

1.9.3 Experience and expertise of the company staff

The qualifications and competences of staffs dedicated to perform UIS project will be evaluated in accordance with their general qualifications and IT related competencies (academic qualification, professional certifications and international experience). Proposals should include information about the team to be assigned to this project, the role of each, along with their respective CVs.

Number of staff, short curriculum vitae of **senior and key staff**, particularly for staff to be assigned to this project (mandatory).

Companies should provide information on how many consultants by deliverable would be working On site/ On Remote. (On site work will be an asset.)

The **Project Manager** should have as minimum mandatory requirements:

- ❖at least 5 years of relevant professional experience in experience in the management of Drupal systems; (experience within the UN will be an asset)
- Professional Certification(s) or relevant experience in the related specialized areas;
- ❖ Ability to write in English to a high standard and be able to work in both English and French languages;
- Project Manager professional qualification (presented in project references) which should demonstrate his/her capacity to manage UIS project (minimum 2 references are required).

The profiles of proposed project <u>team members</u>, can be combined or split among different team members.

Functional Expert:

Mandatory:

- ❖ Expert functional knowledge in Drupal with previous hands-on relevant experience, with at least three (3) years experience;
- ❖ Functional Expert professional qualification (presented in project references) which should demonstrate his/her capacity to work on UIS project (minimum 2 references are required);
- ❖ Ability to conduct business analysis and design fact-finding sessions;
- ❖ Ability to document functional requirements and design;
- ❖ Experience in test and release management processes including creation of test case Scenarios.

Desirable:

❖ Knowledge of Drupal WxT and Apache SOLR.

Technical Expert:

Mandatory:

- Solid experience in installing, deploying and configuring Drupal, with at least three (3) years experience, including knowledge of the Drupal technical requirements and tools;
- ❖Technical Expert professional qualification (presented in project references) which should demonstrate his/her capacity to work on UIS project (minimum 2 references are required);
- Experience in assessing, technical planning and carrying out Drupal website functionality upgrades, with at least three (3) years experience;
- Minimum 3 years of experience in customizing Drupal websites, including multilingual sites, responsive sites.
- Previous experience in web development and/or integration with third party applications such Apache SOLR, Tableau visualizations.

Desirable:

- Expert knowledge in extending Drupal including creation of plug-ins, customizing application integration, and implementation of web resources;
- ❖ Past project experience with application development in .NET
- Full project lifecycle experience, including development, unit testing, integration testing, and implementation

Solution Architect:

Mandatory:

- ❖ Expert technical knowledge in Drupal, with at least four (4) years of experience in Drupal solution design and architecture processes;
- Solution architect professional qualification (presented in project references) which should demonstrate his/her capacity to work on UIS project (minimum 2 references are required);
- Previous experience in web development and/or integration with third party applications such Apache SOLR, Tableau visualizations.

Desirable:

- Ability to provide direction and leadership in terms of interface design, development, and testing effort for the back-end and user interfaces
- Ability to liaise with Functional, Technical and Software Engineering and Test and Release Management leads to improve development methodology, version control and release management guidelines

1.10 Budget / Basis of Fees

Bidders/ Offerors are required to refer to the ANNEX V – Price Schedule Form and complete all required information & prices.

The Offeror shall indicate on an appropriate Price Schedule, an example of which is contained in the Price Schedule sheet, the prices of services it proposes to supply under the contract, if selected.

The offers are requested to quote <u>160 hours</u> for evolution and corrective maintenance of the Drupal and SOLR environments, outside the warranty period, to be used 24 months Post Go Live.

Reminder:

The <u>Technical part of the Proposal</u> should not contain any pricing information whatsoever on the services offered. Pricing information shall be <u>separated and only</u> contained in the appropriate Price Schedule.

It is mandatory that the Offeror's Proposal numbering system corresponds with the numbering system as provided in the TOR. All references to descriptive material and brochures should be included in the respective paragraph, though material/documents themselves may be provided as annexes to the Proposal/response.

Appendix I: Functional Specifications

1.	Remove "Indicators" from the site
1.1.	Note: due to resource constraints limiting the ability to improve some areas of the
1.1.	website, all indicator pages are being unpublished; all related-indicators are being
	unpublished. This is a short-term measure until these areas on the site (add-in web
	components) can be improved and then republished in approximately 2-3 years. The
	features should therefore be left intact or hidden but NOT removed from the site.
1.2	
1.2.	Remove "Indicators Catalogue" from the View Indicators page and replace it with a
1.2	text box.
1.3.	Unpublish and delete all Indicator Pages
1.4.	Remove all content published for "Related Indicators" from all pages
1.5.	Unpublish all Indicator Catalogues
1.6.	Find and remove all existing links to indicator pages in site content
1.7.	Ensure site Search, breadcrumb navigation, and other site elements are not
	referencing indicators / indicator pages.
1.8.	
2.	Add new Content Types
2.1.	Add "Infographic" content type and publish it to Visualisation Gallery. Also publish
	Infographic to an infographic page with PDF and JPG download options. Example:
	https://www.globalpartnership.org/multimedia/infographic/5-ways-education-can-
	<u>help-achieve-gender-equality</u>
2.2.	Add "Video" content type
2.3.	Add "Slideshow" content type
2.4.	
3.	Change all Topic Pages (change template)
3.1.	Change "Latest News" to "News"
3.2.	Change "In Focus" to "Publications". Review and validate consistency of this title with
3.4.	O
	the list of Content Types being shown in the widget.
3.3.	the list of Content Types being shown in the widget. Change "In Focus" (ie. Publications) and either increase or eliminate the current limit
	the list of Content Types being shown in the widget.
	the list of Content Types being shown in the widget. Change "In Focus" (ie. Publications) and either increase or eliminate the current limit
3.3.	the list of Content Types being shown in the widget. Change "In Focus" (ie. Publications) and either increase or eliminate the current limit to the number of publications that appear under "See More" results.
3.3.	the list of Content Types being shown in the widget. Change "In Focus" (ie. Publications) and either increase or eliminate the current limit to the number of publications that appear under "See More" results. Move the "Carousel" above "Publications"
3.3.	the list of Content Types being shown in the widget. Change "In Focus" (ie. Publications) and either increase or eliminate the current limit to the number of publications that appear under "See More" results. Move the "Carousel" above "Publications" Add a new widget to Topic Page titled "Blogs" with a similar look & feel and
3.3.	the list of Content Types being shown in the widget. Change "In Focus" (ie. Publications) and either increase or eliminate the current limit to the number of publications that appear under "See More" results. Move the "Carousel" above "Publications" Add a new widget to Topic Page titled "Blogs" with a similar look & feel and functionality as "News". Stack the "Blog" widget on the Topic Page just above the
3.3. 3.4. 3.5.	the list of Content Types being shown in the widget. Change "In Focus" (ie. Publications) and either increase or eliminate the current limit to the number of publications that appear under "See More" results. Move the "Carousel" above "Publications" Add a new widget to Topic Page titled "Blogs" with a similar look & feel and functionality as "News". Stack the "Blog" widget on the Topic Page just above the "News" widget.
3.3. 3.4. 3.5.	the list of Content Types being shown in the widget. Change "In Focus" (ie. Publications) and either increase or eliminate the current limit to the number of publications that appear under "See More" results. Move the "Carousel" above "Publications" Add a new widget to Topic Page titled "Blogs" with a similar look & feel and functionality as "News". Stack the "Blog" widget on the Topic Page just above the "News" widget. Add a new text widget titled "Our Role". Default is to display 6-8 lines of text with a
3.3. 3.4. 3.5.	the list of Content Types being shown in the widget. Change "In Focus" (ie. Publications) and either increase or eliminate the current limit to the number of publications that appear under "See More" results. Move the "Carousel" above "Publications" Add a new widget to Topic Page titled "Blogs" with a similar look & feel and functionality as "News". Stack the "Blog" widget on the Topic Page just above the "News" widget. Add a new text widget titled "Our Role". Default is to display 6-8 lines of text with a "Read More" button. Width of widget is the same as "News" widget and it is stacked
3.3. 3.4. 3.5. 3.6.	the list of Content Types being shown in the widget. Change "In Focus" (ie. Publications) and either increase or eliminate the current limit to the number of publications that appear under "See More" results. Move the "Carousel" above "Publications" Add a new widget to Topic Page titled "Blogs" with a similar look & feel and functionality as "News". Stack the "Blog" widget on the Topic Page just above the "News" widget. Add a new text widget titled "Our Role". Default is to display 6-8 lines of text with a "Read More" button. Width of widget is the same as "News" widget and it is stacked above "News" and "Blogs" on the right side of the page.
3.3. 3.4. 3.5. 3.6.	the list of Content Types being shown in the widget. Change "In Focus" (ie. Publications) and either increase or eliminate the current limit to the number of publications that appear under "See More" results. Move the "Carousel" above "Publications" Add a new widget to Topic Page titled "Blogs" with a similar look & feel and functionality as "News". Stack the "Blog" widget on the Topic Page just above the "News" widget. Add a new text widget titled "Our Role". Default is to display 6-8 lines of text with a "Read More" button. Width of widget is the same as "News" widget and it is stacked above "News" and "Blogs" on the right side of the page. Add a new widget to Topic Page titled "Explore our Data" (see visual mock-up in
3.3. 3.4. 3.5. 3.6.	the list of Content Types being shown in the widget. Change "In Focus" (ie. Publications) and either increase or eliminate the current limit to the number of publications that appear under "See More" results. Move the "Carousel" above "Publications" Add a new widget to Topic Page titled "Blogs" with a similar look & feel and functionality as "News". Stack the "Blog" widget on the Topic Page just above the "News" widget. Add a new text widget titled "Our Role". Default is to display 6-8 lines of text with a "Read More" button. Width of widget is the same as "News" widget and it is stacked above "News" and "Blogs" on the right side of the page. Add a new widget to Topic Page titled "Explore our Data" (see visual mock-up in subsequent section). This "Explore our Data" widget will appear on the Topic Page
3.3. 3.4. 3.5. 3.6.	the list of Content Types being shown in the widget. Change "In Focus" (ie. Publications) and either increase or eliminate the current limit to the number of publications that appear under "See More" results. Move the "Carousel" above "Publications" Add a new widget to Topic Page titled "Blogs" with a similar look & feel and functionality as "News". Stack the "Blog" widget on the Topic Page just above the "News" widget. Add a new text widget titled "Our Role". Default is to display 6-8 lines of text with a "Read More" button. Width of widget is the same as "News" widget and it is stacked above "News" and "Blogs" on the right side of the page. Add a new widget to Topic Page titled "Explore our Data" (see visual mock-up in subsequent section). This "Explore our Data" widget will appear on the Topic Page above the "Publications" widget. The "Explore Data" widget will display all "Data
3.3. 3.4. 3.5. 3.6.	the list of Content Types being shown in the widget. Change "In Focus" (ie. Publications) and either increase or eliminate the current limit to the number of publications that appear under "See More" results. Move the "Carousel" above "Publications" Add a new widget to Topic Page titled "Blogs" with a similar look & feel and functionality as "News". Stack the "Blog" widget on the Topic Page just above the "News" widget. Add a new text widget titled "Our Role". Default is to display 6-8 lines of text with a "Read More" button. Width of widget is the same as "News" widget and it is stacked above "News" and "Blogs" on the right side of the page. Add a new widget to Topic Page titled "Explore our Data" (see visual mock-up in subsequent section). This "Explore our Data" widget will appear on the Topic Page above the "Publications" widget. The "Explore Data" widget will display all "Data Products" related to this Topic. Determining how to identify what is a "Data Product"
3.3. 3.4. 3.5. 3.6.	the list of Content Types being shown in the widget. Change "In Focus" (ie. Publications) and either increase or eliminate the current limit to the number of publications that appear under "See More" results. Move the "Carousel" above "Publications" Add a new widget to Topic Page titled "Blogs" with a similar look & feel and functionality as "News". Stack the "Blog" widget on the Topic Page just above the "News" widget. Add a new text widget titled "Our Role". Default is to display 6-8 lines of text with a "Read More" button. Width of widget is the same as "News" widget and it is stacked above "News" and "Blogs" on the right side of the page. Add a new widget to Topic Page titled "Explore our Data" (see visual mock-up in subsequent section). This "Explore our Data" widget will appear on the Topic Page above the "Publications" widget. The "Explore Data" widget will display all "Data Products" related to this Topic. Determining how to identify what is a "Data Product" is up to the contractor. One option would be to introduce "Data Product" as a Tag
3.3. 3.4. 3.5. 3.6.	the list of Content Types being shown in the widget. Change "In Focus" (ie. Publications) and either increase or eliminate the current limit to the number of publications that appear under "See More" results. Move the "Carousel" above "Publications" Add a new widget to Topic Page titled "Blogs" with a similar look & feel and functionality as "News". Stack the "Blog" widget on the Topic Page just above the "News" widget. Add a new text widget titled "Our Role". Default is to display 6-8 lines of text with a "Read More" button. Width of widget is the same as "News" widget and it is stacked above "News" and "Blogs" on the right side of the page. Add a new widget to Topic Page titled "Explore our Data" (see visual mock-up in subsequent section). This "Explore our Data" widget will appear on the Topic Page above the "Publications" widget. The "Explore Data" widget will display all "Data Products" related to this Topic. Determining how to identify what is a "Data Product" is up to the contractor. One option would be to introduce "Data Product" as a Tag that can be applied to any content type (Visualization, Video, Slideshow, Infographic,
3.3. 3.4. 3.5. 3.6.	the list of Content Types being shown in the widget. Change "In Focus" (ie. Publications) and either increase or eliminate the current limit to the number of publications that appear under "See More" results. Move the "Carousel" above "Publications" Add a new widget to Topic Page titled "Blogs" with a similar look & feel and functionality as "News". Stack the "Blog" widget on the Topic Page just above the "News" widget. Add a new text widget titled "Our Role". Default is to display 6-8 lines of text with a "Read More" button. Width of widget is the same as "News" widget and it is stacked above "News" and "Blogs" on the right side of the page. Add a new widget to Topic Page titled "Explore our Data" (see visual mock-up in subsequent section). This "Explore our Data" widget will appear on the Topic Page above the "Publications" widget. The "Explore Data" widget will display all "Data Products" related to this Topic. Determining how to identify what is a "Data Product" is up to the contractor. One option would be to introduce "Data Product" as a Tag that can be applied to any content type (Visualization, Video, Slideshow, Infographic,
3.3. 3.4. 3.5. 3.6. 3.7.	the list of Content Types being shown in the widget. Change "In Focus" (ie. Publications) and either increase or eliminate the current limit to the number of publications that appear under "See More" results. Move the "Carousel" above "Publications" Add a new widget to Topic Page titled "Blogs" with a similar look & feel and functionality as "News". Stack the "Blog" widget on the Topic Page just above the "News" widget. Add a new text widget titled "Our Role". Default is to display 6-8 lines of text with a "Read More" button. Width of widget is the same as "News" widget and it is stacked above "News" and "Blogs" on the right side of the page. Add a new widget to Topic Page titled "Explore our Data" (see visual mock-up in subsequent section). This "Explore our Data" widget will appear on the Topic Page above the "Publications" widget. The "Explore Data" widget will display all "Data Products" related to this Topic. Determining how to identify what is a "Data Product" is up to the contractor. One option would be to introduce "Data Product" as a Tag that can be applied to any content type (Visualization, Video, Slideshow, Infographic, etc.) in the publishing workflow.

4.2.	Add support for "Infographic", "Slideshow", and "Video" content types
4.3.	
5.	Add sliding carousel to top of website front page
5.1.	An animated carousel or slider needs to be added to the initial uis.unesco.org
	webpage as the initial banner.
5.2.	This carousel will replace the existing photo at the top of the homepage
5.3.	The UIS content editor needs the ability to add/modify/delete the set of images and the call-to-action text in the slider.
5.4.	Each carousel image may have a unique call to action text string that is a link to
	another page on the UIS website or an external site.
5.5.	If this new call to action link takes the user to a page on the UIS website, that page should utilize the same banner image.
5.6.	Since all topic pages have a default theme banner image, part of this deliverable will be the ability to override each topic page with a banner image that is different than it's default theme.
5.7.	Refer to visual examples in the subsequent section of this document.
5.8.	
6.	Change "Explore Themes" on front page to display all Education and Non-Education
C 4	Themes in a single consolidated view
6.1.	Produce a new design that shows all UNESCO themes and the list of Topic Pages in a single consolidated view thus eliminating the 4 Tabs.
6.2.	Once accepted, the design must be implemented and integrated into the site.
6.3.	The fonts and colours need to adhere to the UIS site design standards.
6.4.	
7.	Propose and implement redesign of Visualization Gallery
7.1.	Propose redesign of Viz Gallery which incorporates Filters to permit site users to filter
7.2	and subset the list of gallery items.
7.2.	Eliminate 4 tabs across top of gallery and incorporate the content of the tabs (themes) into the Filter approach. Alternatively, hide the tabs in all cases where there
	is no content in the Viz Gallery (ie. Culture; Communications).
7.3.	Include other Content Types in the Viz Gallery (Infographics, Video, Slideshow, etc.)
	and introduce Content Type to the Filter approach.
7.4.	Propose new name for Viz Gallery which reflects all new content types.
7.5.	Analyse and identify impact on Gallery if it was changed from the current "publish to
	visualization gallery" process to instead be a Gallery which simply displays all content
	tagged as "Data Products".
7.6.	If accepted, implement the change.
7.7.	
8.	Add Donate Button and create call-to-action page
8.1.	UIS has established a corporate PayPal account for individual donations respecting UNESCO policies.
8.2.	UIS wishes to add a DONATE button to its website. The contractor is asked to make
	recommendations which are consistent with overall design and which is cost efficient
	to implement.
8.3.	The presence of the Donate button on any given page is to be controlled in the
	content-publishing workflows.
8.4.	A Donate page (see subsequent section) is to be created using existing templates.
8.5.	Example for reference: http://www.unesco.org/donate/
8.6.	
9.	Apply patches and updates

9.1.	Review current patch level of Drupal and SOLR implementations.
9.2.	Assess and recommend which patches to apply.
9.3.	Apply, Test, Deploy agreed patches, including patches for Drupal Modules in a cloned version of the production environment prior to applying them to production.
9.4.	
10.	Review and modify Access Control rights
10.1.	Review current users and their access rights.
10.2.	Change access rights to correspond to the level required to carry out their publishing responsibilities.
10.3.	Validate and confirm that access-rights are working as intended and publishers can successfully carry out their tasks.
10.4.	
11.	Onboarding of new UIS Webmaster
11.1.	Soon to be hired webmaster will be knowledgeable of Drupal but not of the UIS implementation. The contractor will train the webmaster in order to empower and enable the individual to: • independently undertake the majority of site maintenance and evolution tasks; and
	 provide expert guidance to internal UIS stakeholders concerning existing site capabilities during site evolution planning discussions.
11.2.	

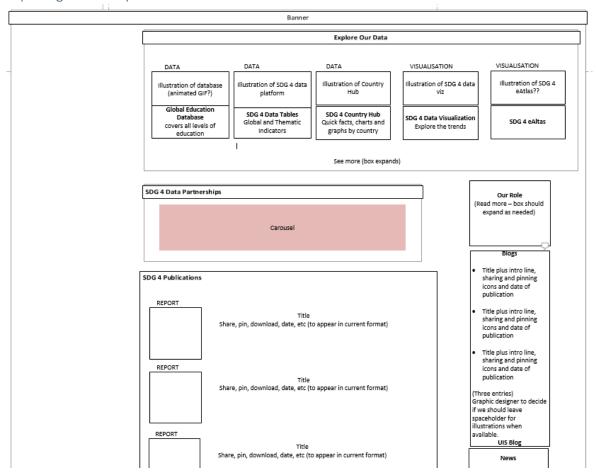
Add sliding carousel to website front page

Examples of similar carousel on other websites:



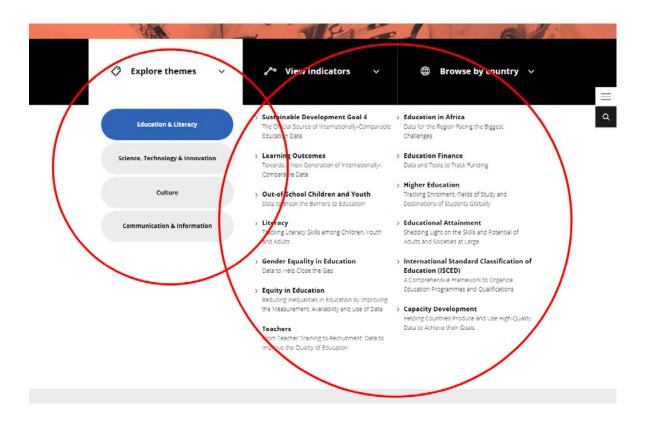


Topic Page – mockup



Change "Explore Themes" on front page to display all Education and Non-Education Themes in a single consolidated view

The initial uis.unesco.org webpage shows the following display.



Donate to UIS

Suggest that the donate button appear on the following pages:

- Homepage: Right below the Twitter box or below the New Data box
- Relevant pages in About Us section box to the right just below connect http://uis.unesco.org/en/about-us
 http://uis.unesco.org/en/contact-us

Donate to UIS Data

We need your support

- 617 million children and adolescents are unable to meet minimum levels of proficiency in reading and mathematics
- One in five children between the ages of 6-17 are out of school
- 131 million girls are excluded from education
- Less than 30% of the world's researchers are women
- 750 million adults are illiterate and the majority are women

These are just a few of the most widely cited statistics produced by the UNESCO Institute for Statistics, which is the official source of internationally-comparable data to monitor progress towards Sustainable Development Goal 4 on education and key targets related to science, culture and communication.

The entire international development community – from governments and UN agencies to donors and civil society groups – relies on UIS data to set policies, direct resources and drive advocacy campaigns so that no-one is left behind in efforts to achieve the SDGs.

All of our data are freely available, including the UIS global education database, which is the most comprehensive in the world with about 6,000 variables and indicators, to the R&D database, which is the only source of internationally-comparable data for countries at all stages of development.

We need your support to continue to produce the data needed to transform lives.

(INSERT INFO ON FUND AND HOW THE MONEY WILL BE USED).

Appendix II: Non-Functional Specifications and Standards

UIS Web Standards:

- Mobile standards
- Browser standards
- Performance standards
- Web Platform & CMS standards
- Content Publishing Standards
- Content Update and Deployment Processes
- User Personas
- Information Architecture
- Content Architecture
- Source code repository standards

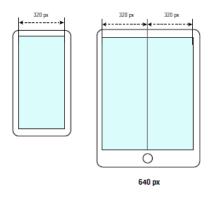
Mobile Standards & Breakpoints

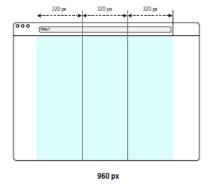
The UIS web presence defines a "mobile device" as a device that is not physically tethered to its internet connection. These devices can range in size but are normally smaller that a desktop pc and larger than a smartwatch: Laptop / NetBook / Mobile Computer, Chromebook, Tablet, Smartphone

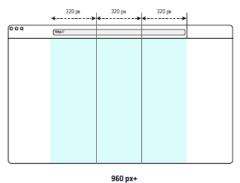
UIS aims to achieve w3c compliance and comprehensive cross browser support with mobile responsive functions by taking a Responsive approach to design for multiple devices and to create dynamic changes to the appearance of a website, depending on the screen size and orientation of the device being used to view it.

Responsive rules for Desktop & mobile versions screen width

The mobile version includes tablet & Cellphone. Depending on the mobile device screen width, a desktop or a mobile version will be showed.





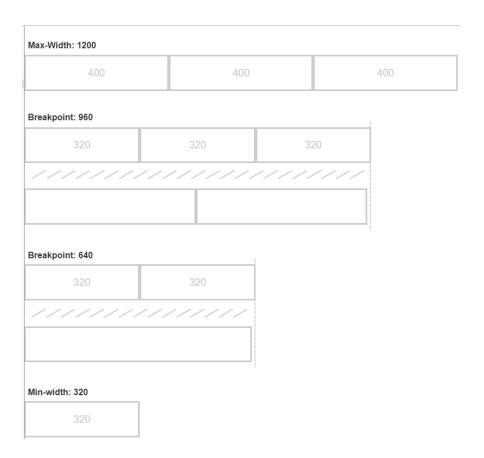


2. RESPONSIVE GRID

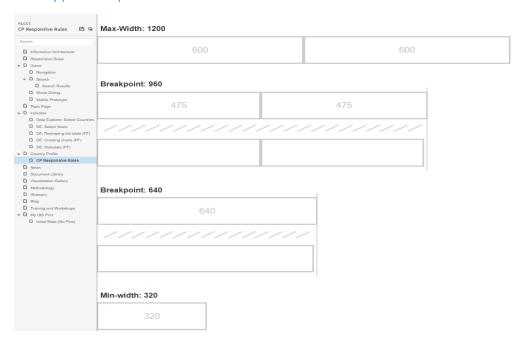
Modern websites need to be viewed on a wide range of form factors and devices, and it is something that has to be though from the beginning in the design process.

To do so, we created a 320px-column grid that can scale to phones, tablets, laptops and desktops. Each user interface element present in this toolkit is designed relatively to one or more columns. The number of columns available defines how much of multi-column interface element can be represented (if at all), and how many single column elements can be represented.

The grid acts as a fundamental element that allows combination, scaling and reuse of interface components.



Country profile responsive rules



3.2 Browser Standards

The website must support the latest versions of Chrome, Safari, Firefox and Internet Explorer

- Chrome
- IE Edge 13 (is it good to put specific versions?, they might change)
- Firefox 49
- Safari 10
- Internet Explorer: the site must support versions 10 and 11 but not earlier ones

All work done for the UIS must:

- Respect Web standards: (http://www.webstandards.org/learn/faq/)
- Respect W3C Compliance standards requirements for HTML, CSS and JQuery Library

All work done for the UIS should:

Meet W3C WCAG AA checkpoint for accessibility (https://www.w3.org/TR/WCAG20/)

3.3 Website Performance standards

3.3.1 Peak traffic estimates and concurrent user load

- Pages are expected to be fully rendered and viewable in a browser in 3-5 seconds.
 - The total time from request to full page load should be no more than 5 seconds. This should be measured from the time a user sends a request to the time the page has loaded and is useable in their browser.
 - o For any large content, such as PDFs, they should be optimized so that they first page is loaded and presented immediately, with subsequent pages appearing as they are downloaded, so as to provide the end user with a fast user experience and allowing them to begin using the content even before it has fully loaded.

DRUPAL:

- A session is the period time a user is actively engaged with the website. Based on a 24-hour period the UIS has 4,000 sessions per day, site-wide. Pageviews is the total number of pages viewed. Pageviews are much higher at 14,000 per day, with an average of 583-750 pageviews per hour.
- The latest designs for each page of the Data Portal show from 1 to around 10 visualizations per page. This means that, on average, each page load requires the loading of 5 separate visualization components.
- A peak of around 1000 page views per hour. With an average of 5 visualizations per page that totals 5000 visualization impressions per hour
- Traffic-The new portal will assume around 200 page views per hour. With an average of 5 visualizations per page that totals 1000 visualization impressions per hour. That's 1000 separate API calls (depending on the final endpoint definition, each visualization may require more than 1 API call).

- Responsive rules above defining screen width requirements.
- SOLR Search: should handle 10 searches per hour with a maximum of 3 active searches at any
 one time
- NADA: Current traffic peaks (as of November, 2016) at around 8 page views per hour. In order to
 account for projected increase in demand following the launch of the new portal we will
 assume around 11 page views per hour. Current maximum simultaneous users is 1. Allowing
 for growth following the release of the new site, we expect a maximum of 2 simultaneous
 users.
- .STAT: Current traffic peaks (as of November, 2016) at around 95 page views per hour. In order to account for projected increase in demand following the launch of the new portal we will assume around 127 page views per hour. Current maximum simultaneous users is 15 (based on google analytics for the past year). Allowing for growth following the release of the new site, we expect a maximum of 20 simultaneous users.
- eAtlas: We currently have no google Analytics information about the eAtlas usage. We will therefore use .STAT data as a reasonable maximum estimate of likely traffic to this site. This means projected demand following the launch of the new portal we will assume around 127 page views per hour and we expect a maximum of 20 simultaneous users.
- Microsites As these are all relatively new sites, we do not have sufficient historical data to
 provide existing usage metrics. The expected load for these is low, so we will therefore use
 expected load figured that have been established for NADA.
 - o TCG (On Premise): 11 visits per hour and 2 concurrent users to this site at peak times.
 - o GAML: 11 visits per hour and 2 concurrent users to this site at peak times.
 - o SDG: 11 visits per hour and 2 concurrent users to this site at peak times.
 - o IEG: 11 visits per hour and 2 concurrent users to this site at peak times.

3.3.2 Uptime requirements

• 99.9% is the targeted uptime for all customer-facing services.

3.3.3 Traffic requirements

• Based on current usage and taking the highest figure, we can estimate around 4000 page views per day or approximately 166 per hour.

3.3.4 Response times - data portal, web component rendering, embeddable code

Embeddable code: Visualisations are expected to be fully rendered and viewable in a browser in
 3-5 seconds. The same standard is applied to applications other than data visualisations
 (including profile charts and graphs and embeddable data graphs)

3.3.5 API Performance

- Response Times: The API should respond within 1 second. This should be timed from the moment the API endpoint request is received to the time the response is sent.
- Load: The API can handle 10000 requests per hour within the 1-second response time limit.
- Concurrency: The API can handle 30 requests per second within the 1-second response time limit.
- Scalability: The API should be able to handle 50 separate API calls per second without degradation in performance

- Availability: The UIS is targeting 99.9% uptime for all API services. This target does not include the availability of the Azure cloud
- Multiple Geographies: UIS API content is of global interest and the UIS API needs to cater to
 multiple geographies. For the first version 3 geographies have been identified: North America,
 Europe, Asia Pacific
- Reliability: Ensure our online environment provides users with a service available 24 hours a day
 and 365 days a year uptime with automatic data updates in order to reinforce the UIS
 reputation as the UN depository for internationally comparable data in the fields of Education,
 Science, Culture and Communications

3.4 Web Platform and CMS Standards

The UIS Website is composed from the following platforms:

- Microsoft Azure Cloud Computing Platform & Services. It is used to host the whole website infrastructure.
- CMS Powered by Drupal V7. Is a Content Management System powering the website. It is using the Drupal WxT distribution (http://openplus.ca/wxt/
 - It meets Web Accessibility and Web Usability standards by using the most proven best practices with CSS3, HTML5, and jQuery in order to meet today's web functionality and reliability requirements.
 - Website should be accessible via mobile devices
 - Website design should be according to UX best practices
 - o Web interface to access and manipulate data (improve data exploration)

To these platforms we integrate the following components, collectively representing all UIS public facing web services:

- SOLR Search Engine (Azure)
- Embeddable Web components (see http://component.uis.unesco.org)

Web Components library is written in JavaScript and Visualizations are based on this library. They consume data provided by Data API Services, and display data inside the Drupal CMS.

- o The Framework for these components is designed around REACT.js, NODE.js, and REDUX.
- They leverage RESTful data access, SOLID Design principles and state full approach.
- Data from APIs:
 - o Open Data API (see http://apiportal.uis.unesco.org)
- Applications:
 - eAtlas (External service)
 - Visualizations

- o UIS Survey Questionnaire Application
- o NADA Catalogues (On Premise)
- o UIS.Stat (On Premise)

Microsites

- o TCG (On Premise)
- o GAML (OpenPlus) External service
- o SDG (On Premise) External service
- o IEG (OpenPlus) External service

Responsive and Multilingualism are managed either within Drupal or within each of these components individually

Drupal CMS Integration standards

• iFrame embedding

There should be no iframe embeds in any new application. Web services endpoints should be developed so data can be fetched and then displayed the way you want on the Drupal application. Otherwise, responsive will need to be implemented both in the Drupal installation, and in the embedded application(s), which means a lot more time needed to implement and maintain the responsive in the future. Endpoints are configured via URLs. The application that used to be embedded via iframe should now be able to send data in a json/xml format when queried via URL requests. The goal is to have the external application still contain all of the data, but to have the Drupal application theme manage how this data is displayed.

• Directly embedding on HTML page using DIV tags and AJAX

This strategy could still exist in the future Drupal application, although it would differ slightly. Any developed JavaScript scripts could be referenced in the Drupal application. These scripts should not affect content data, only its behavior. Style should be achieved with CSS, data should be fetched either from the Drupal database or from the third party web services endpoints If any scripts are developed outside of the Drupal installation, they can be included in Drupal via a custom module, which would append the desired script to Drupal. It would be considered akin to a library, instead of a stand-alone script.

Responsive and multilingualism would be possible and easily implemented. Since the scripts would be used to affect the content's behavior and not the data itself, data could be searchable as long as it resides in the Drupal database.

Also note that visualizations embedded this way on mobile might not be relevant since mobile behaviors are mostly trigger via touch events (click equivalent). Galleries are easily implement inside Drupal. It can be achieved using any JavaScript libraries like fancybox or colorbox (or many others).

• Embedding via the Template page (NADA)

These embeds should be moved completely within the Drupal installation. The goal would be to abandon the use of external applications. All content should be moved inside the Drupal database to allow greater control over the searchability and multilingualism.

Any custom code from the custom applications should be transformed into Drupal modules. Responsiveness would be handled by the Drupal theme itself. Maintainability would be dramatically improved. The look and feel would be seamless.

• Embedding via Hyperlinks

These are not technically embeds. It is simply a link to another URL where a visualization resides. These visualizations can be considered stand-alone websites, and could reside anywhere on the application servers. All content within these visualizations cannot be indexed or searched by Drupal, and responsive and multilingualism are managed inside each and every one of them.

3.5 Content Publishing Standards

What is the Publishing Processes, Workflow and Roles for CMS specific Content

- Who and where (writer, editor, reviewer, publisher, dev, staging and prod) (see below)
- Web content editor has access to Staging
- Content editors manage and publish content

Essential Roles and user permissions to support the UIS publishing workflows

Developer - Super Administrator

- Has access to all of Drupal functionalities
- Can update or tweak Drupal components
- Can break the website if used incorrectly
- Role should be assigned only to IT members

Administrator - Website Manager

- Can create, edit or delete users
- Can adjust user settings and permissions
- Has all the publishing rights
- Can create, edit and delete any content
- Can publish and unpublish any content
- Is not restricted to any section of the website
- Role should be assigned only to UIS department head members (e.g.: Jennifer, DOAP)

Editor - Website Section Manager

- Is assigned to a certain section of the website
- Can be assigned to more than one section
- Can create, edit and delete all content contained in the assigned section
- Can publish and unpublish all content contained in the assigned section
- Role should be assigned to department members

Writer - Content Writer

- Can be assigned to a specific section of the website (or not)
- Can create and edit content
- Can delete its own content

- Cannot delete content from other writers
- Cannot publish content
- Role can be assigned to anyone, inside or outside of UNESCO

Reviewer - Content Reviewer

- Can be assigned to a specific section of the website (or not)
- Cannot create, edit or delete any content
- Can only post comments on content for the writer
- Role can be assigned to anyone, inside or outside of UNESCO

Publishing workflows for CMS content

- Users create/update content according to the Roles described above using the DRAFT Moderation State
- Users select the PUBLISHED Moderation State to make the new content of changes to existing content visible into the web site

Publishing Processes, Workflow and Roles for eAtlas

Publishing Processes, Workflow and Roles for UIS Survey questionnaire application

- 1) Approval is received to upload the latest UIS survey questionnaires into the web site
- 2) IT receives the files to be uploaded
- 3) IT updates configuration of UIS Survey questionnaire application in Staging environment
- 4) IT deploys files (.pdf, Excel) into Azure environment via FTP.
 - Using FTP client log in to Azure web application FTP. Create Folder with component name under the /site/wwwroot folder, inside the Azure web application.
 - Deploy all of the contents of the \component-name\dist\ folder into the newly created folder.
- 5) Users verify the Staging environment
- 6) IT updates configuration of UIS Survey questionnaire application in Production environment
- 7) ITOps deploy the files into Production
- 8) Users verify Production environment

Publishing Processes, Workflow and Roles for Glossary

Glossary Admin users create new content and update existing content through Admin interface

Publishing Processes, Workflow and Roles for NADA catalogues

Publishing Processes, Workflow and Roles for OLO Database

Publishing Processes and Workflow for Web Components

3.6 Content Update and Release Management Process

Updating the UIS Drupal Website and other applications have different processes, depending upon what has changed.

VSTS Online and GitHub are used for collaborative development and continuous deployments.

VSTS URL is "https://unesco-uis.visualstudio.com/defaultcollection"

DRUPAL Release Management

- Drupal content updates are done in the Production Drupal website as described in the Drupal Publishing workflow (see ANNEX 5 – Content Publishing Standards)
 - Content managers can delete any content added by any content provider, as they will see all content on the site
 - Content providers can only delete content that they created, as they will see all the content they have created
- Some changes however, require the Drupal Database to be changed (changes to templates for example, changing the site from English-only to Bilingual English/French). In these instances, the release management process is much more involved.
 - o The Drupal PROD website is mirrored to STAGING and the PROD environment is 'frozen'
 - o All changes are made in the STAGING environment and tested.
 - o Once signed off and approved, the STAGING environment is mirrored back to PROD This allows a zero downtime swap, which can be validated and, if there are any issues, can be swapped back quickly with the previous release.
- Access to manage the environments via the Azure platform are controlled via roles. Individual
 users are given permission to certain resources on the Azure platform who could then initiate
 the "swap" between deployment slots.

Release Management for applications not hosted in cloud

Not all applications are cloud hosted, many legacy applications, such as UIS.Stat and NADA are hosted on-premise, other applications, such as eAtlas, are hosted by external service providers.

Workflow for applying development changes in Azure

All code for the Drupal CMS and components are stored within VSTS in two separate GIT repositories. Each repository has two branches: Dev and Master. When changes are made in order to fix bugs, the process is supposed to be as follows:

NOTE: This process requires the user to have either an account on the CMS server with sudo rights, or the password for the cmsadmin account, plus they must have an alternate authentication credential setup in VSTS, with permissions to access the required GIT repositories. The process for setting up an alternate authentication credential is through "Security" link available once you are logged on to https://unesco-uis.visualstudio.com/

1.) Commit changes to Dev

Developer commits changes to the Dev branch of the appropriate GIT repository

2.) Test the change

- Once you have completed the update in Dev, notify the CMS team so that they can validate the change and ensure the results are as expected and that nothing else has been broken as a result.
- IT Operations validates that the change is applied to the correct branch, then applies the changes to the Master branch
- When testing is completed, it has to be signed off for the update to be applied to Prod. DO NOT proceed further without this authorization

3.) Commit changes to Prod

- At the point we assumed that the change has been committed to the Master branch
- IT Operations validates that the change is applied to the correct branch, then applies the changes to the Prod branch

Deploying Web component via GitHub or Visual Studio Team Services

Deployment is possible directly from the external repository. This should be a preferred way of deployment since it keeps a release history along with comments, provides an easy way to version and manage the releases, provides easy way to rollback and undo the releases. For this we need to configure the deployment from a GitHub repository in Azure.

Steps to deploy the web component to Azure:

- Create a folder under the local Github Distr repository, for example: <u>/WCL-Distr/component-name/</u>
- Copy the contents of compiled component from \component-name\dist\ folder to a <u>/WCL-Distr/component-name/</u>
- Commit the <u>/WCL-Distr/component-name/</u> and then Push this new folder to Github.
- From Azure, Click Settings, Deployment source and then Sync. This will deploy the component to Microsoft Azure.

Ref: https://azure.microsoft.com/en-us/documentation/articles/web-sites-publish-source-control/

Deploying files (.pdf, Excel) into Azure environment via FTP

There is no configuration required on Azure. Following steps need to be performed:

- Using FTP client log in to Azure web application FTP. Create Folder with component name under the /site/wwwroot folder, inside the Azure web application.
- Deploy all of the contents of the \component-name\dist\ folder into the newly created folder.

VSTS Release Management

All the custom VSTS Release tasks necessary to provision and configure the Azure resources needed to support the project. Release definitions for CMS, API Management, SDMX API for 4 distinct environments (Dev, Test, Stage, Production). The code base for the tasks and the exported Release Definition json files are in the UIS Azure Redesign Git Repository at DevOps/ReleaseManager/UIS_ReleaseDefinitions and DevOps/UIS_ReleaseTasks

Uploading Release Management Tasks to VSTS

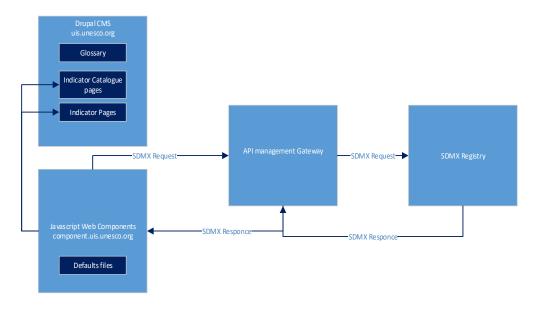
To maintain the custom Release Management tasks that are used to provision the UIS infrastructure it will require the usage of the Cross Platform VSTS Command Line Interface. This utility will be used to upload, delete, and modify VSTS Tasks in the UIS project collection.

The utility instructions, download and install information is located at https://www.npmjs.com/package/tfx-cli

Working with the command line utility is requires a Personal Access Token (PAT) and the URL to the VSTS server. Each user as described in the section "Agent Details" will need to configure their own PAT as necessary to manage the VSTS Tasks.

The Website Update - Web Components and CMS

The UIS UNESCO Website consist of 2 main parts, Drupal CMS and Client side JavaScript Web Components. The following figure illustrates all the parts of the website affected by Data Release.



1. Drupal CMS

The following items should be updated when doing data release:

- 1. Glossary definitions. Theses are controlled by the reference metadata of the registry. However, currently the website does not retrieve this data directly from the API. An intermediate file needs to be generated by Duraid which then is uploaded to the website by Ed.
- 2. Adding or removing indicator pages. This only needs to be done if the data release adds or removes indictors pages. In case if new indicator pages are added the related indicators for each of the new indicator pages should be defined and added to the new page. This process is managed by Andrew Barton.
- 3. Full Testing of Components and Indicator pages, which should include testing of Indicator Catalogue pages, Indicator pages and Pinboard. Responsible for testing: Andrew Barton, Andrey Talman, Duraid Abbas, Ioulia Sementchouk.
- 4. Adding new Indicator Catalogue pages. The Indicator Catalogue pages are sub sites targeting particular data subset, Example: SDG4, Education in Africa and Equity in Education. Each of these pages housing the Indicator Catalogue web component. If data release requires creating new sub site, the new Indicator Catalogue page need to be created. Changes may need to be applied to Web Components in order to support new subsite.

2. Web Components

The following items should be updated when doing data release:

 Refreshing the Defaults files. The default files controls which countries and years to use display the indicator charts by default. This information needs to be updated when the data is refreshed. DB Architect and Dev are responsible for updating this file. Dev is responsible for uploading this file within the Web Component. Please note: Currently we have one defaults file for each sub site we support.

- 2. Full Testing of Components and Indicator pages, which should include testing of Indicator Catalogue pages, Indicator pages and Pinboard. Dev is responsible for testing.
- 3. When new Indicator Catalogue pages need o be created, the following 2 tasks need to be done for the web components in order to support the new sub site:
 - a. The new defaults file may need to be generated, this requires modifications of the defaults file generator application. Marc Bouffard and Andrey Talman are responsible for generating new file.
 - b. Depending on the new sub site requirements, Web Component needs to be updated in order to support these requirements. Full testing of the Web Components is required especially when adding new Indicator Catalogue pages. Andrey Talman is responsible fot making changes to web components, Andrew Barton and Andrey Talman for testing of the new pages.

3.7 User Personas

WEBSITE AND END-USER DISSEMINATION PRODUCTS

A number of personas were identified to help shape the direction and usage of the Web site and of the Web services offered via the new API.

NOTE (2018/07): These personas are being reviewed and are likely to change in the coming months.

Web site user profiles and needs

1) Persona - Evelyn Beginner user; BBC Journalist

Has been assigned to cover higher education in South America. Works mostly alone. Has visited UIS a few times. Will not spend a lot of time on the site. Has a core story and is looking for data to support it. Doesn't necessarily understand the exact indicator she's looking for.

Tasks:

- Search by topics
- View country profiles
- Basic site search

Needs and goals:

- Wants a fast, easy way to get an answer
- Publishing news articles w/citation; infographic w/citation
- Looking for particular country/ies data; comparison between countries
- Not familiar with data center and offerings; would like to be guided to the country profile
- Needs to understand the terminology used to better explain the situation
- Might be looking for information in the wrong terms (e.g "inflation")
- Will search for whatever seems to be the easiest way to find an answer

2) Persona -Sergei; Mid-level user; CIDA Project Advisor; Development Project Advisor, CIDA

Is the typical international organization user. Is currently an advisor for a series of educational projects in Africa. Works in multiple workgroups. The Data Center is one of the regular sources for his work, along with other databases. He has used the data center for the last 6 years and knows his way around. Subscribes to the mailing list and is aware of data release schedule

Tasks:

- Uses country profiles and predefined tables
- Looks at data and trends over time; benchmarking progress
- Compares regional data country to country
- Compares regional averages
- Uses basic charting features
- Exports data
- Shares data with others

Needs:

- Information on a particular region
- Interested in getting data updates about particular themes or regions
- Take data and use it elsewhere
- Print country profiles
- Access data quickly
- · Customized his data views
- Create charts and maps
- Find related info, reports and entry profiles
- Embed tables, charts, graphs, data into reports
- Compare data across countries or compare indicators
- Understand limitations and use of the data
- Save the information to his personal files or archives

3) Persona - Toshiko; Power user; Ph.D. Candidate

Ph.D. in engineering at the University of Tokyo. Her focus is National Systems of innovation and RD. Works in a small research lab, sometimes in small group projects. Started using the Data Center 6 months ago and has been using it heavily since. She has a very good knowledge of data, methodology, procedures, limitations and everything related to statistics. Knows indexes and metadata well

Tasks:

- Uses specialized tools
- Uses custom and pivot table functions
- Uses advanced search
- Uses metadata: survey instruments, methodological documents
- Uses reports and glossary
- Exports data
- Requests data

Needs and goals:

- Needs access to all available resources
- Wants to feel like the system can support her advanced---level requests
- Precise terminology
- Clean and simple
- Needs very precise information
- Access surveys and specific questions in surveys
- Needs to easily identify methodology used

4) Persona -Carl; Casual user; Engaged Citizen

Is interested in high--profile themes (e.g Girl's Education). Arrives at the site by chance. First time visiting the UIS site. Doesn't know anything about UIS. Is a temporary audience: might interact with a product but not explore the site further

Tasks:

- View visualizations
- View country profiles

Needs and goals:

- Wants to know more about a single topic
- Wants to further his knowledge about a subject that interests him
- Expects a simple experience

Additional Profiles:

- National Statistician: Very advanced users, who can potentially be data providers
- Teachers/Youth: New users, who could be interested in the data collected by the UIS
- Low-Bandwith Users: Users with slow Internet connections

Data API user profiles and needs

1) Persona - David the local UIS Web Portal developer

David is an expert developer who works at the UIS and is familiar with SDMX, RESTful web services and UIS data. David has developed data visualizations and products using the original DAS web service offering of the UIS. David wants to develop the web components required for the new UIS website redesign. David will also be developing specialized UIS data products, such as the UIS Embeddable Data Graphs, which will depend on the API for data. David will not just be consuming the API; he will also be pushing new requirements for extending the API, especially in the area of "non-SDMX" API requirements. As an internal Developer of UIS Products, David will have access to some UIS-only API extensions that 'public' users of the API will not be able to access.

2) Persona - Mary the developer at the World Bank

Mary, like David is also used to consuming some of the original DAS services offered by UIS. She is technical and understands how to read and process statistical data returned by the API. Unlike David, Mary creates some larger applications that have many users. As such she expects quick response times and that the service will not slow down considerably under load. She may push up against any

throttling that is put in place but due to her relationship with UIS may be able to set up increased access to the API.

3) Persona - Paul the external web developer

Paul is a developer outside of the UNESCO family. He has discovered the API through the public UIS Data Portal and wants to integrate some data queries into an application he is developing. He will register via the new API developer portal and try out some of the queries using the portal. As he is not familiar 6 with SDMX or processing statistical data he may find the SDMX JSON that is returned difficult to work with initially. Paul may benefit from an aggregation service which simplifies the data or endpoints which help return simpler basic representations of the data.

4) Persona - Amy the external mobile app developer

Amy is focused on creating mobile applications and as such cares about the size of responses coming back from the API. She will appreciate the server being setup to compress output to minimize the payload when one of her users is on a metered connection. Like Paul, she will use the developer API portal to read the documentation and try out the API before integrating.

5) Persona - Bruce the inexperienced developer

Bruce is an independent developer playing with the new API to write his own application. He may write inefficient applications which query the API more frequently than needed and may inadvertently call it endlessly through an infinite loop. He is a good reason to have some basic throttling in place to prevent a single user creating excessive load on the API, even if it is by accident.

6) Persona - Lucy the editor at The Economist / Paulette the editor at UNESCO

Lucy puts together articles at The Economist but is not a developer. She will be most interested in the embeddable widgets offered via the UIS Data Portal. She will get the embed code from the portal and use this in one or more of the articles she is putting together. Lucy expects the widget she embeds to load quickly from anywhere in the world the article is being viewed from.

3.8 Information Architecture

UIS developed enterprise information standards, taxonomies, and metadata frameworks for data and content, which unlocks the information assets to be used across the entire application's portfolio of the enterprise, as well as across organization boundaries to aid interaction through exchange of information between enterprise suppliers, partners, service providers, and customers thus enabling business agility

UIS adhere to the 6 architecture design principles for defining the Information Architecture Reference Framework:

- Data Creation, Accessibility & Availability: users must have access to accurate, relevant and timely data to render or consume an effective UIS service
- Data is shareable
- Data Security & Permission: duty to protect and secure sensitive information must be balanced against the duty to share and release public information
- Standard, common vocabulary and data / metadata definitions: ensure seamless interoperability while interchanging data
 - Addresses non-functional requirements such as responsiveness, performance, scalability, security, usability, findability, accessibility have an especially significant influence on the information systems and technology architecture.
 - Organize, structure and label content in an effective and sustainable way, by taking into consideration:
 - o Context: business goals, funding, politics, culture, technology, resources, constraints
 - Content: content objectives, document and data types, volume, existing structure, governance and ownership
 - o Users: audience, tasks, needs, information-seeking behavior, experience

IA for the new UIS website was designed with the following goals:

- 1. Users should easily search, find and access the data and products
- 2. Users should easily customize the data according to their specific needs
- 3. Users should easily share UIS data and related products as part of efforts to improve dissemination
- 4. Users are encouraged to use UIS data by presenting the statistics in different types of formats/products
- 5. Greater visibility of UIS data through strong branding

UIS improves Information retrieval experience

Achieved through Centralised Site Search Index Content:

- All metadata contained in the fusion registry
- All content on web pages

- All document content (PDF, Excel, Word) stored in the content management system— e.g., UIS
 questionnaires and instruction manuals, internal and external publications, fact sheets,
 analytical reports, technical papers, user guides)
- All content contained in UIS Glossary
- All blog content
- Tags (all pages)
- All standalone products

Search Engine Results Page (SERP):

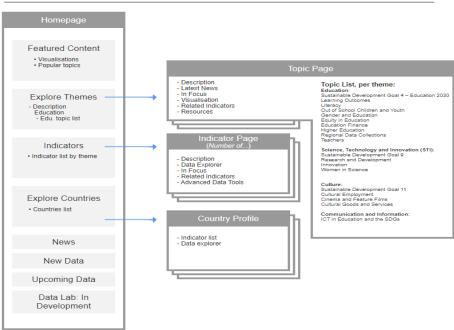
- Supported results page features to be included in version
 - Recent search history
 - Sharing functionality of search result
 - PIN functionality of search result
 - Direct document download functionality from individual results for documents
 - Date of publication for web page or document
 - File size of document
 - Type of document
 - Page navigation functionality
 - Theme filter
 - Content filter
 - Featured results
- · Types of results to be presented
 - Any type of page (static or dynamic) of the 15 base web pages
 - Any type of document stored in the content management system

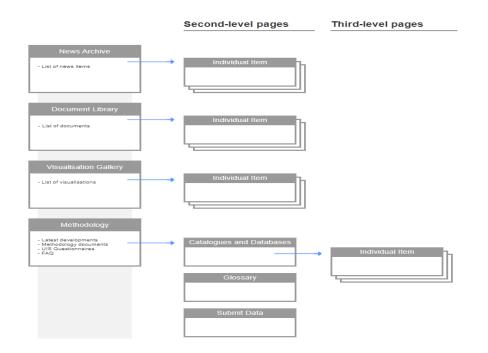
Availability Requirement

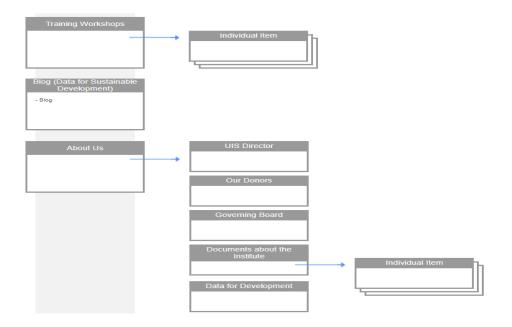
The UNESCO UI requirements centre around navigating to find indicators via Category tree, and assisting a user in constructing a data query, making use of Hierarchical Codelists to provide various breakdowns.

Sample of Web-centric view of organizing and navigating page content: (*source: Yucentrik, LS_UIS_RFQv05*)

First-level pages







There are three types of data being managed

- Content data (the pages, images and documents being loaded within Drupal or within the databases for the API)
 - This is stored within the Drupal VM (in the case of the website) or within the databases (in the case of the APIs).
- Code data (see Source code repository)
- Provisioning data (see Source code repository)

Third party tools and websites include:

Applications

- o UIS director blog (actually in Wordpress transitioning to Drupal)
- o UIS Glossary (referred to wireframe and graphical design)
- Learning Assessments database (refer to Mock-ups)
- UIS.Stat need new graphical design, could be applied internally by UIS http://data.uis.unesco.org/
- NADA / IHSN Data Catalogues
 - Learning Assessments:
 http://www.uis.unesco.org/nada/en/index.php/catalogue/learning_assessments
 - Innovation: http://www.uis.unesco.org/nada/en/index.php/catalogue/innovation

Internally and externally developed visualisations to be integrated into new site (links):

- eAtlases:
 - Teachers: http://tellmaps.com/uis/teachers/
 - Literacy: http://tellmaps.com/uis/literacy
 - Out-of-School Children: http://tellmaps.com/uis/oosc/
 - R&D: http://www.tellmaps.com/uis/rd/
 - Gender: http://tellmaps.com/uis/gender/
- Mind the Gap: Gender and Education
 http://www.uis.unesco.org/Education/Pages/mind-the-gap.aspx
- Women in Science
 http://www.uis.unesco.org/ LAYOUTS/UNESCO/women-in-science/index.html
- o Global Flow of Tertiary Students: http://www.uis.unesco.org/Education/Pages/international-student-flow-viz.aspx
- Out of School Children
 http://www.uis.unesco.org/ LAYOUTS/UNESCO/oosci-data-tool/indexen.html#en/cover
- o Left Behind http://www.uis.unesco.org/ LAYOUTS/UNESCO/no-girl-left-behind/index.html
- Education 2030
 http://www.uis.unesco.org/ LAYOUTS/UNESCO/education-2030/index.html
- Short film 2016
 http://www.uis.unesco.org/Education/Pages/meet-education-2030-data.aspx
- Learning assessment capacity index (LACI)
 http://www.uis.unesco.org/ LAYOUTS/UNESCO/laci/

Applications that provide data and content for the Web site

1. UIS Data Centre

- Country and regional profiles
- Global Rankings
- UIS Gallery
 - o Learning assessment capacity index (LACI)
 - o <u>UNESCO eAtlas of Gender Inequality in Education</u>
 - o Education 2030
 - o Left Behind
 - o Out of School Children
 - o <u>UNESCO eAtlas of Teachers</u>
 - o UNESCO eAtlas of Out-of-School Children
 - o UNESCO eAtlas of Literacy

- o <u>UNESCO eAtlas of Research and Experimental Development</u>
- o Women Researchers
- o Data Tell Us
- o Global Flow of Tertiary Students
- o Women in Science
- o Global Demand for Teachers
- o International Literacy Day
- o Mind the Gap: Gender and Education
- Early Childhood Care and Education
- o Education Finance
- o Education Quality in Sub-Saharan Africa
- o Out-of-school children (2012 data)
- UIS Embeddable DataGraphs
 - o <u>UNESCO Country Pages</u>
 - UNESCO Transparency Portal
- 2. Glossary
- 3. IHSN Data Cataloguing Tool (NADA)
- 4. Individual visualisations:
 - Full screen visualisations:
 - o Education 2030
 - o Learning assessment capacity index (LACI)
 - o Left Behind
 - o Out of School Children
 - o Women in Science
 - eAtlas visualisations
 - o <u>UNESCO eAtlas of Gender Inequality in Education</u>
 - o UNESCO eAtlas of Literacy
 - o UNESCO eAtlas of Out-of-School Children
 - o <u>UNESCO eAtlas of Teachers</u>
 - o <u>UNESCO eAtlas of Research and Experimental Development</u>
 - iFrame integrated visualisations
 - o Global Flow of Tertiary Students
 - o Early Childhood Care and Education
 - o Mind the Gap: Gender and Education
 - Galleria based visualisations
 - o Education 2030
 - o Regional Data Collections
 - o Regional Data Collections Adult Education in Latin America and the Caribbean
 - o Regional Survey Sub-Saharan Africa
 - Visualisations to be built in 2016
 - o R&D Investment

- Short film 2016
- 5. Database of Learning Assessments

3.9 Content Architecture

Drupal CMS and has two main sources for its data:

- Drupal CMS for data like news articles, publications, etc.
 - Content refers to all website content to be displayed on the pages, including images, text and documents (PDF, DOC, XLS, and PPT) being loaded within Drupal or within the databases for the API. This is stored within the Drupal VM (in the case of the website) or within the databases (in the case of the APIs).
- API for statistical data & metadata that is needed by the data components of the website like country profiles, visualizations, indicator definitions
 - Standalone apps: Glossary, UIS Catalogues (NADA)
 - Third-party Visualizations: Hosted in the data center gallery
 - Embeddable Objects: html/css/javascript based code snippets embedded in external websites
 - o UIS.STAT Browser

Content Types

- Information page
 - o Content & file assets: Images and ALT tags
- News
- Blog
- Documents (Reports, Brochures, and other PDF documents)
 - o File assets: PDFs and Excel
 - o Can add a 'Document Summary' and a 'Descriptive summary' of the publication
- Training & Workshop (Event)
- Twitter Tweet Feed
- Twitter User Profile
- Visualizations (place holder for collection of visualizations)
- Indicators (place holders for Indicator code)
- Country Profile Page
- Topic (collection of content related to a specific topic, content can includes news, documents, visualisations, and indicators)
 - Can specify a Web component to use (e.g. http://api.uis.unesco.org/sdmx/categoryscheme/UNESCO/SDG4/latest?references =parentsandsiblings)
- Pages (Document Landing Page)
- Custom pages (Methodology)

- Special content types that bring in external data (Glossary).
- Home Page (Explorers: Theme, Indicator, Country)
- Microsites: GAML and IAG integrated into Drupal

Content stored in Drupal

- All documents are stored in the content management system and are accessible throughout the site (not only the document library), except the automatically generated PDF files in the IHSN Data Cataloguing Tool and the Learning Assessments Database
- Learning Assessments Database Excel File hosted in CMS
- User guide for UIS.Stat is stored in the back end of UIS.Stat.
- Excel and PDF files accessible in UIS.Stat are stored in the content management system.
- File formats currently used are MS Office formats (Excel, PowerPoint and Word), Adobe format (PDF) and images (JPEG or PNG).

Content is categorized according to the following taxonomy:

- Categories
- Country
- Document types
- Event types
- Hashtag Terms
- Themes
- Topics
- User Mention Terms

Content Architecture Topology

Refer to "UIS Content Architecture v3.2.xlsx"

Overview of different types of web pages illustrating different content type:

- 1. Home page
- 2. Search Page
- 3. Navigation Page
- 4. Topic Page
- 5. Indicator Page
- 6. Country Profile Page
- 7. News Page
- 8. Document Library Page
- 9. Visualisation Gallery Page
- 10. Methodology Page
- 11. Glossary Page
- 12. Data Lab Page (Blog)
- 13. Training and Workshops Page
- 14. My UIS Pins
- 15. My UIS Pins Initial State Page

16. Others

- a. About UIS pages
- b. UIS Questionnaire Page
- c. IHSN Data Catalogue Page
- d. OLO Database Pages
- e. Survey respondent site
- 17. Landing pages for standalone platforms
 - a. UIS.Stat wireframed at bottom of indicator pages
 - b. IHSN Data Catalogue
 - c. eAtlas (<u>Teachers</u>, <u>Literacy</u>, <u>Out-of-School Children</u>, <u>R&D</u>, Gender)

Title Features Workbench (Moderation)	Basic Page	News	Glossary	Blog	Country Profile	Indicator	Visualization	Training Workshop	Topic Page	Document
	(Methodology -						(Data/Gallery)	(Events)		
Workbench (Moderation)		pp 25			12			200	ar and a second	40
	YES	YES	NO NO	YES	YES NO	YES	YES	YES	YES	YES
Commenting Type (Panels)	Node_View	Node_View	NO Node_View	Node_View	Node + Term Behavious	Node_View	Node_View	Node_View	NO Node + Term Behaviour	Node_View
Source/Storage Landing Page	Local DB NO	Local DB /news/	Remote API /glossary/	Local DB /blog/	Remote API NO	Remote API NO	Local DB / Links /visualization/	Local DB /training-workshops/	Local DB NO	Local DB /documents/
	NO.	ynemay	/ grossery/	yology	No) Yisuanzationy	/ training-workshopsy	No.	youthensy
Patterns		(6) B	9		p					V
URL Path Metadata Token	/content/node-title	/news/node-title	/glossary/node-title	/[blog-type]/node-title	/country/node-title	/indicator/node-title		/training-workshops/node-titl	t /topic/node-title	/document/doc-type/node
Fields										
Title [H1]	YES	YES	YES	YES	YES	YES	YES	YES	YES	YES
Body	YES	YES	YES	YES	YES	YES	YES	YES	YES	YES
Summary	NO	NO	NO	YES	NO	NO	NO	NO	NO	NO
Published Date Override	NO	YES	NO	NO	NO	NO	NO	NO	NO	YES
Feature Slider	NO	YES	NO	NO	NO	NO	NO	NO	YES	NO
Featured Image	NO	YES	NO	YES	NO	NO	YES	NO	YES	YES
File Attachments	NO	NO	NO	NO	NO	NO	NO	NO	NO	Multiple (Executive Su
Relationship										
(Related) Node Search?		YES								
Topics	YES	YES	YES	YES	YES	YES	YES	YES		YES
Country	YES	YES	YES	YES		YES	YES	YES	YES	
Feature In-Focus	Option	Option	Option	Option	Option	Option	Option	Option	Option	Option
Title Taxonomies	Basic Page (Methodology -	News	Glossary	Blog	Country Profile	Indicator	Visualization (Data/Gallery)	Training Workshop (Events)	Topic Page	Document
OMMON (for relatations)					YES (Country)				YES (Theme)	
e (4 terms Also as a facet)	NO	YES	NO	NO	NO	YES	YES	YES	YES	YES
rpe Specific (and as facet)	NO	NO	NO	NO	YES - Regions	Theme Level 2/3	NO	YES - Region	Theme Level 2/3	YES (Document)
										Adelhadolism
										Information paper
										Fact sheet
										Bhochune
										Institutional document
										Questionnaire
										Survey manual
										Survey manual Workshop documents
										Survey manual Workshop documents Meeting documents
										Survey manual Workshop documents Meeting documents
										Survey manual Workshap documents Meeting abouments Calalogueldwabase docum ISCED Maganga
										Survey manual Workehop documente Meeting documente Calalogueldalabase docum ISCED Mapping Vacancy notice
										Survey manual Workshap documents Meeting abouments Calalogueldwabase docum ISCED Maganga
										Survey manual Wantehan documente Meeting documente Catalogueldalabase docume ISCED Magaring Vacancy notice
Views		Home	Fliters (toppele for land	Bloe main list	A.7 (By Theme)	A. 7	Main gallery	Workshop Main		Survey menual Waladaha dasumenta Melangu dasumenta Calahas elekikahan dasume ISCED Majaring Vasansy natisa Majarindahan Janganada
Views		News main list	Fliters (toggle for lan	Blog main list		A-Z Group	Main gallery	Workshop Main		Survey manual Workehop documente Meeting documente Calalogueldalabase docum ISCED Mapping Vacancy notice
				Blog main list			Main gallery	Workshop Main		Survey menual Walashan dasumenta Heletaga dasumenta Catalagu etakutenta dasum ISCED Magaing Vasancy natice Hegu esti for pagasasta
Views Widget (or content t		News main list Filters (toggle to s	earch)		Group (By Theme)	Group	10 Table 1 Tab		TBD	Schnigsstandel Westschap dazumente Adeologi dazumente Casilagi arbistature dazume SEED Magneti SEED Magneti Viscanzi rasilie Pingunet Arr propossale TBD
		News main list Filters (toggle to s Share (Nodes only	earch)	Share (Nodes only)	Group (By Theme)	Group CUSTOM Embed	Share	Share	TBD	Servermanual Varietina procumente Neeling alexamente Calaliga antiseibase classes SEED Messons Vasconivration Programmatic Programmatic Filing and has programmatic TBD Share
		News main list Filters (toggle to s	earch)		Group (By Theme)	Group	10 Table 1 Tab		TBD	Schnigsstandel Westschap dazumente Adeologi dazumente Casilagi arbistature dazume SEED Magneti SEED Magneti Viscanzi rasilie Pingunet Arr propossale TBD

3.10 Source code repository standards

This section is intended to provide the rules for the external developers to send sources code to the UIS. It should also provide guidance to UIS staff on how the Release Process and Branching works.

VSTS Online and GIT repository are used for storing data, collaborative development and continuous deployments. In order to facilitate this collaboration, the UIS will provide a single Visual Studio Team Foundation Services (VSTS) site for all planning artefacts (release plan, backlogs, user stories, issue/bug tracking, etc.)

- Code data (the code that actually provides the functionality for the Drupal CMS site and web components)
 - This is stored in GIT repositories accessible through and managed in VSTS. The code is typically split into two branches for each team:
 - Web Components Visualization Dev and Master branches
 - Drupal CMS Dev and Master branches
 - SDMX Web API Master branch only
 - Legacy Applications Master branch only
 - o Backup As this code will be stored in a GIT repository. The actual web app should not need to be backed up, instead the GIT repository must be regularly backed up.
 - Retention GIT repositories keep a record of all code versions over time. However, a retention time for the GIT repository backups needs to be established.
- Provisioning data (the scripts and releases used for the initial provisioning of the environments).

 This is also stored in a GIT repository (DevOps) under a single Master branch.
- Recommendations and guidelines
 - The GIT repository must be regularly backed up. There is one common location for all Project backlogs for each Stream / contract and then one overall High Level backlog.
 - All source code must be provided to the UIS through a use of a UIS owned GIT repository (unless otherwise agreed with UIS management).
 - The site must follow a Blue/green development approach.
 - Source code must be stored in Git repository.
 - Any new code must integrate in current UIS structures so the packages structure do not require too much changes and we keep a compatibility with the old code structures.
 - Any new code must be integrated in our versioning system so we can keep track of the changes and versions
- Agile Approach
 - The UIS wishes to take an Agile approach to these projects built around 2 Week Sprints. The successful bidders will be responsible for developing a list of Epics and Features, maintaining an up-to-date backlog and working with the UIS project team to prioritize features throughout the development period.

• Iterative and Incremental

• UIS adopts a more iterative and incremental approach to its web presence and data. All decisions and approaches should be done with this longer term iterative approach in mind.

Guidelines for implementing an Iterative and incremental approach include:1

- Any difficulty in design, coding and testing a modification should signal the need for redesign or re-coding.
- Modifications should fit easily into isolated and easy-to-find modules.
- Modifications should become easier to make as the iterations progress. If they are not, there is a basic problem such as a design flaw or a proliferation of patches.
- Patches should normally be allowed to exist for only one or two iterations. Patches may be necessary to avoid redesigning during an implementation phase.
- The existing implementation should be analyzed frequently to determine how well it measures up to project goals.
- User reaction should be solicited and analyzed for indications of any deficiencies

Packaging of the Web components and Current Structure

src/		source files				
	index.js	entry point file for commonjs				
	app.js	entry point file for umd				
	views/	React stateless UI components				
	containers/	React/Redux logical components				
	reducers/	Redux reducers				
	actions/	Redux action creators				
	utils/	specific utils				
	assets/	styles, images, fonts, data files				
test/		test files				
package.json		npm package description file				
README.md		documentation file				

Notes:

• small components can adopt a simpler structure by skipping views, containers, stores and actions folders in favor of a single file

- 52 - Revised: June 2017 BFM/FPC

¹ adapted from https://en.wikipedia.org/wiki/Iterative and incremental development

- closely related components can be gathered into a single configurable component (charts components have different views but have the same stores and actions)

Package

A web component should ideally be a <u>npm</u> package and follow the guidelines of the community. It should at least have a <u>package.json</u> file that describe the package to npm and an entry point.

A package.json file provides following:

- It serves as documentation for what packages and 3rd party libraries (and version of these libraries) project depends on
- It allows to specify the versions of a package that the project can use using semantic versioning rules
- Makes the build reproducible which means that its way easier to share with other developers.
- The npm package manager should be used for packaging and versioning web component. Npm is a default package manager for the JavaScript runtime environment Node.js The semver versioning system was chosen as a versioning system

Version

Since a web component should be npm package, it should follow the same versioning system.

This system is <u>semver</u> with some <u>additional rules</u> specific to npm:

- Starting version is 1.0.0
- Bug fixes and other minor changes is a Patch release, increment the last number, e.g. 1.0.1
- New features which don't break existing features is a Minor release, increment the middle number, e.g. 1.1.0
- Changes which break backwards compatibility is a Major release, increment the first number,
 e.g. 2.0.0

Disaster recovery

Since all sites must be coded following the blue/green development approach, it must be
possible to rebuild any site from the code base by using the relevant build script. The disaster
recovery approach would therefore be to rebuild the site, and restore the content data from
backup.

API Configuration - Git Source Control

As part of the API Management service there is an associated Git Version Control repository that enables you to store and manage different versions of the API Management configuration and associated metadata. Having the configuration stored in Git will allow you to make bulk configuration changes or small changes to a singular area without having to use the API Management Publisher

portal. This will also allow you to close the repo and treat the configuration as part of the normal software engineering process following a modern DevOps CI/CD pipeline.

Consider leveraging this functionality and developing a CI/CD release strategy that will enable you to deploy changes to Dev, Test, Stage, and Production in a controlled process workflow. This will also enabled separation of responsibility from API configuration, Published Products to Developer Portal design with each able segment to be changed/managed individually.

Specific details can be found at https://azure.microsoft.com/en-us/documentation/articles/api-management-configuration-repository-git/

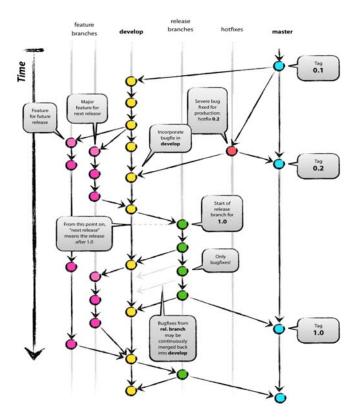
Navigate to the "Configuration repository" tab found in the "Security" page and "Save configuration to repository" once all initial configuration has been completed, this includes APIs, Policies, Products have been defined. After additional changes are made save the updated configuration to commit the updates.

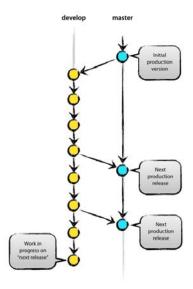
Consider implement a controlled DevOps CI/CD build and release process and treat the API Management configuration with the notion of "Configuration as Code". To implement this type of process using the integrated Git API Management Report the following approach is recommended.

- 1. Make necessary configuration changes to the API Management in the Dev environment.
- 2. Save changes in the API Management Publisher Portal to the native API Management Git Repo
- 3. Establish the initial Clone to a local Git Repo, one time activity.
- 4. Establish a clone of the UIS Azure Redesign Git Repo, one time activity
- 5. Copy the api_managment folder from the API Management Git Repo to the UIS Azure Redesign Repo, one time activity
- 6. Add the new files to the UIS Azure Redesign Repo, one time activity
- 7. Commit and then push the changes to the UIS Azure Redesign Repo, one time activity
- 8. All Developers, Designers work the USI Azure Redesign Repo for making API Management configuration changes thru the html,xml, json files.
- 9. Create a Build and Release CI workflow that adds a PowerShell task that on approval pushes changes from the UIS Azure Redesign Repo to the API Management Repo
- 10. Optionally Automate deployment of API Management Repo to the API Management site to update configration with the latest changes, over wise manually login to the Publisher portal and Deploy changes.

UIS uses the following Git branching model (http://nvie.com/posts/a-successful-git-branching-model/)

The Git branching model at this URL provides a visual representation of the UIS branching strategy and release management process





• Supporting branches

Next to the main branches Master and Development which we described in Annex 6 related to Deployment processes, our development model intends to uses a variety of supporting branches to aid parallel development between team members, ease tracking of features and integration from different vendors, prepare for production releases and to assist in quickly fixing live production problems. Unlike the main branches, these branches always have a limited life time, since they will be removed eventually.

The different types of branches we may use are:

- Feature branches
- Release branches
- Hotfix branches

ANNEX IV – Proposal Submission Form

TO: UIS

To form an integral part of your technical proposal

Dear Sir / Madam,

Having examined the Solicitation Documents, the receipt of which is hereby duly acknowledged, we, the undersigned, offer to provide Professional Services for the sum as may be ascertained in accordance with the Price Schedule attached herewith and made part of this Proposal.

We undertake, if our Proposal is accepted, to commence and complete delivery of all services specified in the contract within the time frame stipulated.

We agree to abide by this Proposal for a period of 90 days from the Proposal Closing Date as stipulated in the Solicitation Documents, and it shall remain binding upon us and may be accepted at any time before the expiration of that period.

We understand that you are not bound to accept any Proposal you may receive.

Name of Bidder:

Address of Bidder:

Authorised Signature:

Name & title of Authorised Signature:

Date:

ANNEX V - Price Schedule Form

GENERAL INSTRUCTIONS

- 1. The Bidder is asked to prepare the Price Schedule as a separate envelope from the rest of the RFP response as indicated in paragraph 15 of the Instructions to Offerors.
- 2. All prices/rates quoted must be exclusive of all taxes, since the UIS is exempt from taxes as detailed in Annex II, Clause 18.
- 3. The Price Schedule must provide a detailed cost breakdown. Provide separate figures for each functional grouping or category. If travel is required all costs will be calculated according to UNESCO travel rules.
- 4. It is the policy of UIS not to grant advance payments except in unusual situations where the potential contractor whether a private firm, NGO or a government or other entity, specifies in the proposal that there are special circumstances warranting an advance payment. UIS, at its discretion, may however determine that such payment is not warranted or determine the conditions under which such payment would be made.

Any request for an advance payment is to be justified and documented and must be submitted with the financial proposal. This justification shall explain the need for the advance payment, itemise the amount requested and provide a time-schedule for utilisation of said amount.

Financial Proposal / Price Schedule

Request for Proposal Ref:						
Total Financial Proposal [currency/amount]:						
Date of Submission:						
Authorized Signature:						
Description of Activity/Item		No of Consultants (Specify Junior/Senior)	Rate per Day [currency/ amount]	No of man- days	Total [currency/amount]	
1.	Functional and Non Functional Requirements		•			
1.1	Remove "Indicators" from the site					
1.2	Add new Content Types					
1.3	Change all Topic Pages (change template)					
1.4	Change Visualisation Slider					
1.5	Add sliding carousel to top of website front page					
1.6	Change "Explore Themes" on front page to display all Education and Non- Education Themes in a single consolidated view					
1.7	Propose and implement redesign of Visualization Gallery					
1.8						

1.9	Apply patches and updates		
1.10	Review and modify Access Control rights		
1.11	Onboarding of new UIS Webmaster		
1.2	Training		
1.3	Maintenance Phase: Evolution and corrective maintenance 160 hours		
1.4	Other (please specify)		
2	Other Expenses		
2.1	In case third party software or licenses are needed to the implementation, please indicate.		
2.2	Reproduction and Reports		
2.3	Equipment and other items		
2.4	Other (please specify)		

ANNEX VI – Vendor Information Form

General Information							
Email Address:							
	ı						
Line of Business, area of expertise:							
er, distributor,							
Past Contracts with other UN organizations:							
References: Please provide at least three references including contact details for contracts for similar services to the one requested under this consultancy:							
Contact perso	n:	Telephone:	Email:				
	er, distributor, ganizations: least three references ted under this	rganizations:	rganizations: least three references including contact ested under this consultancy:				