

Integrated Nutrition and Deworming Program: Improving Adolescent Health & Nutrition - Bangladesh (DAWN)

Request for Proposals for

Developing a Behavior Change Intervention

Issued by Nutrition International

Deadline for receipt of concept note (as per RFP):

Monday, April 02, 2018

11:59PM [Dhaka, Bangladesh] Time

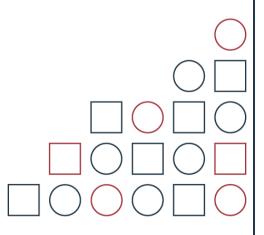


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Request for Proposal Notice

Nutrition International (NI), a non-profit organization dedicated to eliminating vitamin and mineral deficiencies worldwide, invites proposals from competent Consultant/agency(s) or Agencies for developing a behavior change intervention (BCI) strategy to integrate into the Integrated Nutrition and Deworming Program: Improving Adolescent Health & Nutrition - Bangladesh (DAWN) program.

About Nutrition International

Nutrition International (NI), a renowned international development organization based in Ottawa, Canada, has a commitment to eradicate global 'hidden hunger' by implementing global interventions that focus on women and children in developing countries. It aims to generate innovative and sustainable solutions to reduce vitamin and mineral deficiencies among women, newborns, and children. It builds on robust evidence-based research and evaluation in order to demonstrate excellent return on investment in scaling-up highly cost-effective micronutrient interventions. Nutrition International aspires to be a global center of excellence in technical and programmatic support in this field.

With its international Board of Directors and in collaboration with key stakeholders such as governments, the private sector, and civil society groups, NI seeks to tackle micronutrient malnutrition that affects one third of the world's population. NI engages in tailoring health and nutrition strategies as well as up-scaling existing program in various regions including Africa, Asia, the Caribbean, Latin America and the Middle East; in total, the reach extends to approximately 500 million people in more than 70 countries.

One of NI's key strategic goals is to enhance the global impact of micronutrient interventions by generating cutting-edge knowledge and utilizing it to develop sound policies and programmes while consolidating political will to achieve its vision. NI aspires to position itself as a global center of excellence in generating scientific research in the field of micronutrient programmes. It provides quality assurance for research and programmes while disseminating and translating new knowledge to influence and improve national and global policies and programmes. Nutrition International provides guidance and support on existing and future programme evaluations and coordinates the analysis and utilization of evaluation activity results.

Project Background & Rationale

Globally, more than two billion people suffer from micronutrient deficiencies¹. Adolescent girls are among the most affected by micronutrient deficiencies; they also are prone to more severe micronutrient deficiencies complicated by the risk of becoming pregnant².

In Bangladesh, although specific data for adolescent girls is not abundant, approximate rates of anaemia among 'neither pregnant nor lactating' (NPNL) women range from 25-40% according to the National Micronutrient Survey 2011 and Bangladesh Demographic and Health Survey

²Jahan K & Hossain M (1998) Nature and Extent of Malnutrition in Bangladesh. Bangladesh National Nutrition Survey, 1995–96. Dhaka, Bangladesh: Institute of Nutrition and Food Science, University of Dhaka.



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¹UNICEF/Micronutrient Initiative (2004) Vitamin and Mineral Deficiency. A Global Progress Report. Ottawa: Micronutrient Initiative.

2011. The World Health Organization (WHO) considers anemia a moderate to severe public health problem³.

In general, iron deficiency and the prevalence of anaemia in girls increase during adolescence due to greater iron requirements to support rapid growth and to replace losses due to menstruation. Iron requirements become greatly elevated if an adolescent girl becomes pregnant. Iron deficiency is assumed to be responsible for 50% of anaemia cases globally, though this may not be the case in Bangladesh as elevated iron levels are present in the water supply in some districts.

Undernutrition has declined, though at a pace that has not matched rapid improvements in other indicators. These achievements can be attributed to sound plans and government commitment to implement the 3rd HNP Sector Programme. However, as Government of Bangladesh (GoB) recognizes, challenges remain in the HNP sector including developing and enhancing adolescent healthcare in Bangladesh⁴. Undernutrition in this age group persists as a result of inadequate access to nutritious food and adequate health care, and suboptimal disease control (including poor sanitation and hand washing).

As well as nutritional anaemia, parasitic infection-driven anaemia reduces the iron stores of adolescents. Bangladesh has the second highest soil transmitted helminthiasis (STH) prevalence rate globally (after India). It is endemic in all 64 districts⁵, with higher prevalence in rural areas compared to urban areas.⁶ School-age children (including adolescents) are particularly vulnerable, harboring the highest intestinal worm load which negatively impacts their growth, health, and cognitive function. Consequently, their educational achievement (and by extension, wage-earning potential) can suffer.⁷

According to the World Bank "a mother's age at marriage and first delivery has a significant effect on the birth weight and nutritional status of her children. The high rate of child marriage in Bangladesh also leads to early abandonment of education8". Keeping girls in school delays marriage and positively impacts their health and nutrition. In addition to GoB incentivizing girls education during the last couple of decades the World Bank and GoB investments in the Secondary Education Quality and Access Improvement Programme9 have improved transition rates and retention. The gross secondary enrolment rate for girls 11-15 years old has increased to 61%10 - making this the best platform to reach this target group. Whilst girls' rate of enrollment of has markedly increased, boys' rates and retention have remained stagnant.11 GoB recognizes this and is ensuring equitable inclusion of boys in all Programmes geared towards benefiting students.

NI has committed to provide technical and financial support through its innovative Nutrition Leverage and Influencing for Transformation (N-LIFT) business model, funding for which it

 $^{^{11}\,}http://www.worldbank.org/en/results/2014/03/11/bangladesh-incentivizing-secondary-education$



³ WHO: (http://www.who.int/vmnis/anaemia/prevalence/anaemia data status t4/en/).

⁴ Concept Paper for the 4th Sector Programme (July 2016-June 2021), Final Version, Ministry of Health and Family Welfare, Government of the People's Republic of Bangladesh, April 2015; Concept Note, 4th Sector Programme.

⁵ Akter, Ali, & Dey, 2014; Wash Plus, 2013.

⁶ Hawlader et al, 2014.

⁷ Ngonjo et al. (2016). Current Status of Soil-Transmitted Helminths among School Children in Kakamega County, Western Kenya. Journal of Parasitology Research. Article ID 7680124

⁸ World Bank Group.

 $^{^9\,}http://www.worldbank.org/en/results/2014/03/11/bangladesh-incentivizing-secondary-education$

¹⁰ Bangladesh Education Statistics, 2014, http://banbeis.gov.bd/data/, accessed on 24 August 2016.

received from the Government of Canada¹². The mandate of N-LIFT is "to use proven existing platforms to ensure access to the unreached and those who are in greatest need of these nutrition services who would not have access through the traditional nutrition platforms used by the NI's core investments". To this end, the DAWN Programme intends to demonstrate the feasibility of a school-based delivery platform for a multi-component intervention to address adolescent health. Gathering sex-disaggregated data on all interventions will provide future insights for Programme improvement, and will be key for informing potential scale-up.

DAWN also commits to reduce STH infection through direct support from Johnson and Johnson (J&J) to the GoB's Communicable Diseases Control and Prevention Programme by expanding this successful Programme for younger children to now reach adolescents up to 18 years old, and to establish stronger links with the WASH Sector Programme.

Previously, NI has worked with the Institute of Public Health Nutrition/National Nutrition Service (IPHN/NNS) to demonstrate and scale-up a model for strengthening the existing ironfolic acid (IFA) supplementation Programme for pregnant women provided through the public health system.

General instructions & considerations for the RfP

- These instructions should be read in conjunction with information contained in the enclosed Terms of Reference (ToR), and in any accompanying documents within this package.
- This Request for Proposals (RfP) is to develop BCI tools and a BCI strategy in order to support the Improving Adolescent Girls' Health & Nutrition Bangladesh (DAWN) project.
- O Nutrition International is not bound to accept the lowest priced, or any, proposal (concept note). NI reserves the right to request a meeting with any (or all) Respondent(s) to clarify their proposal(s) without commitment, and to publish on its website answers to any questions raised by any Respondent (without identifying that Respondent).
- Respondents are responsible for all costs associated with the proposal preparation and will not receive any reimbursement by Nutrition International.
- Once selected, it is estimated that the successful candidate would complete the contract within approximately 3 months.

Conflict of Interest

- Respondents must disclose in their proposal details of any circumstances, including personal, financial and business activities that will, or might, give rise to a conflict of interest. This disclosure must extend to all personnel proposed to undertake the work.
- Where Respondents identify any potential conflicts they must state how they intend to avoid any impact arising from such conflicts. Nutrition International reserves the right to reject any proposals which, in Nutrition International's opinion, give rise, or could potentially give rise to, a conflict of interest.
- With respect to this condition, please be advised that the organizations that may fall within the scope of this evaluation will include those below, with which any association must be disclosed:
 - Nutrition International
 - the Donor who is the primary funding source for the procurement

RfP General Disclosures

Respondents must disclose:

¹² At the same time, the Programme aligns with the priorities of Global Affairs Canada's "to support the implementation of the Sustainable Development Goals, focus on maternal, newborn and child health that is evidence-driven, and make Canada a leader in development innovation and effectiveness".



- If they are or have been the subject of any proceedings or other arrangements relating to bankruptcy, insolvency or the financial standing of the Respondent including but not limited to the appointment of any officer such as a receiver in relation to the Respondent personal or business matters or an arrangement with creditors or of any other similar proceedings.
- If they have been convicted of, or are the subject of any proceedings, relating to:
 - Criminal offence or other offence, a serious offence involving the activities of a criminal organization or found by any regulator or professional body to have committed professional misconduct.
 - Corruption including the offer or receipt of any inducement of any kind in relation to obtaining any contract, with Nutrition International, or any other contracting body or authority
 - Failure to fulfil any obligations in any jurisdiction relating to the payment of taxes

Submission of Proposal

Qualified consultant/agency(s) or agencies are encouraged to submit a concept note up to <u>4</u> <u>pages (excluding Annexes 1-6 below)</u>, which will briefly describe the BCI development plans. The concept note should follow the same structure of a full proposal aligning with the Terms of Reference presented in **Annex A** of this document. Nutrition International will evaluate the received concept notes and select consultant/agency(s) or agencies from which to request a full proposal.

The selected consultant/agency(s) or agencies would then be expected to submit a full proposal - the **Technical Implementation Plan** - which would be essentially a direct expansion of the concept note. The Technical Implementation Plan should be limited to a maximum of <u>six-to-seven</u> pages and include **Annex 1-6** listed below. The technical implementation plan should align with the Terms of Reference presented in **Annex A** <u>of this document</u>. The Technical Implementation Plan will include the following Annexes:

Annex 1: Qualifications and experience

- Previous BCI development (highlighting experience in supervision or contribution to similar work. Reference to or sample of previous products).
- Qualifications of the key personnel of the team including: Resumes of each of the key team members (up to 3 pages per resume).
- A description of the roles and responsibilities of each of the team members (up to 2 pages).

Annex 2: Timeline

Timeline for the BCI development including all activities, milestones and deliverables mentioned in the concept note aligning with the terms and condition included in $\mathbf{Annex} - \mathbf{A}$ of this document.

<u>Annex 3:</u> Financial Proposal (up to 3 pages – a template is provided in Annex C)

The consultant/agency shall submit a Financial Proposal in a separate file detailing:

- Breakdown of all activities, outputs and deliverables
- Estimated cost disaggregated by the number of days each of the team members will be working
- Dates when separate financial reports will be submitted and when payment will be expected
- All amounts quoted in Bangladeshi Taka.
- Provide a detailed budget, based on the format attached as Annex C



 Fees inclusive of all insurance and standard business overheads and taxes. Nutrition International will not pay for any overhead or indirect costs that exceed 10% of the total direct costs.

Annex 4: Background information.

Annex 5: A risk analysis exercise: Identifying potential risks and barriers of developing the proposal in time.

Annex 6: A list of acronyms used in the proposal.

Cover-Letter and Declaration (up to 2 pages)

- Proposals must be accompanied by a cover letter with the respondent's address. The letter must be signed by a suitable authority to commit the Respondent to a binding contract. It must quote the RFP number and title, and include the declarations provided in **Annex D**.
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Profile

Candidates who are interested in submitting a concept note for this project should have:

- At least five years of experience in developing behavior change interventions and designing communication materials related to nutrition or health of women and children in developing countries. Experience working with adolescents will be preferred.
- Language skills: Speaking and writing English and Bangla
- Familiarity with the context of the region(s) in which the research will be conducted.
- Familiarity with behavior change interventions and international guidelines is an asset
- Experience with sex- and gender-based analysis and gender equality research; knowledge of sexual and reproductive health rights is an asset

Submission

The technical and financial plans shall be put into a covering email with the subject line "DAWN RfP: Developing a Behavior Change Intervention".

Mr. Jalal Chowdhury (E-mail: cjalal@nutritionIntl.org)

Please note:

- Concept notes and proposals must be submitted in English.
- Only e-mail bids will be accepted.
- Only those short-listed will receive an acknowledgment. Candidates may be called for a personal interaction over phone or Skype.
- Late proposals will not be accepted under any circumstances. Proposals received after the due date and time will not be considered.



Receipt, Handling, and Evaluation of Proposals

Once a concept note is received before the due date and time, Nutrition International will:

- Log the receipt of the proposals and record the business information
- Review all proposals and disqualify any non-responsive ones (that fail to meet the terms set out in these instructions), and retain the business details on file with a note indicating disqualification
- Evaluate all responsive proposals objectively in line with the criteria specified below. Inform respondents within five (5) business days of the evaluation decision being made.

Nutrition International reserves the right to:

- Accept or reject any and all proposals, and/or to annul the RfP process, prior to award, without thereby incurring any liability to the affected Respondents or any obligation to inform the affected respondents of the grounds for Nutrition International's actions prior to contract award.
- Negotiate with Respondent(s) invited to negotiate the proposed technical approach and methodology, and the proposed price based on the Respondent's proposals.
- Amend this RfP at any time.

Selection criteria

Submitted concept notes will be shortlisted and then successful candidate(s) will be identified based on the below selection criteria (See Table 1). The successful respondent will be contacted and will be expected to complete a more detailed proposal before entering into a Contract with NI for the duration of the Work. The terms and conditions of this current RfP will normally form part of the Contract.



Table 1: Concept Note Proposal Scoring Criteria

	Request for Proposals for Developing a BCI for DAWN	
Item	Description of requirement	Weights
Profile	Previous experience on undertaking similar assignments	15%
	Availability of adequate and skilled (education and work experience) team members for carrying out the assignment	15%
Concept Note	Proposal demonstrates the ability to fulfill the technical components as proposed	15%
	Identification of anticipated risk and associated mitigation plan	5%
	Operationalization plan included	10%
	Gender and ethical issues well addressed appropriately	10%
Financial Proposal	Reasonable estimate for each of the activities	10%
	Reasonable estimate for consultant/agency's administrative & indirect costs	5%
	Demonstrated consideration of all potential expenses (i.e. no obvious omissions)	5%
Timeline	A clear and reasonable timeline is presented, including specific deadlines, milestones and deliverables	10%
	Total score:	100%



Annex A. TERMS OF REFERENCE

PART I: Project Background Information

Rationale of the Overall Project

According to the 2011-12 Bangladesh National Micronutrients Survey¹³, the prevalence of anemia among adolescents ages 12-14 is over 17%. The prevalence is greater among girls than boys, and more girls suffer from severe anemia.¹⁴ In addition, 9.5% of adolescents 12-14 are deficient in iron, and the amount of iron consumed from food does not meet the recommended requirements¹⁵. Some of the contributing and exacerbating factors include the rapid increase in iron requirements from pre-adolescence, widespread soil-transmitted helminthiasis (STH) infections, inadequate dietary intake, menstruation and early pregnancy among adolescent girls, and suboptimal understanding and practices of nutrition and hygiene.

The Bangladesh Institute of Public Health Nutrition (IPHN) recommends that adolescent girls consume weekly iron-folic acid supplements (WIFA), but to date there have been no national Programmes to carry this out. For this reason, Nutrition International (NI) is collaborating with the Government of Bangladesh (GoB) to implement DAWN in selected districts of Bangladesh, with the long-term goal of scaling up nationwide.

NI has already worked with the Institute of Public Health Nutrition/National Nutrition Service (IPHN/NNS) to demonstrate and scale-up a model for strengthening the existing IFA supplementation Programme for pregnant women provided through the public health system. Now, through the DAWN Programme, NI intends to demonstrate the feasibility of a school-based delivery platform for interventions meant to address both iron deficiency anaemia (IDA) and STH within a target population of adolescent females (as well as males with regard to STH).

NI has committed to provide technical and financial support through its innovative Nutrition Leverage and Influencing for Transformation (N-LIFT) business model, funding for which it received from the Government of Canada. Support for the STH component is also being leveraged through a partnership with Johnson and Johnson (J&J), supporting the GoB's Communicable Diseases Control and Prevention Programme and building on the current successes among younger children to now reach adolescents up to 18 years old while establishing stronger links with the WASH (water, sanitation, and hygiene) Sector Programme.

Project Objectives

Main objective

The overall objective of the DAWN project is to improve the health and wellbeing of adolescents in selected districts of Bangladesh by implementing an integrated school-based package and communication strategy. This involves improving the nutritional (particularly iron and folate) status, reducing rates of anaemia and iron deficiency anaemia, and reducing STH infection (as well as related mortality and morbidity). Ultimately, NI aims to provide recommendations to the GoB about how to best implement its adolescent WIFA policy.

¹⁵ iccdr,b, UNICEF Bangladesh, GAIN, and Institute of Public Health and Nutrition. National Micronutrients Status Survey 2011-12 Final Report. 2013.



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¹³ iccdr,b, UNICEF Bangladesh, GAIN, and Institute of Public Health and Nutrition. National Micronutrients Status Survey 2011-12 Final Report. 2013.

¹⁴ Dharmalingam A et al. Int J Contemp Pediatr. 2017 May;4(3):951-955

Specific Objectives

The specific objectives of the DAWN project are to:

- 1. Identify the existing secondary schools that are most appropriate and effective in the provision of integrated WIFA and nutrition education to adolescent girls.
- 2. Scrutinize, identify and test key factors that would optimize the implementation, efficiency, performance, and cost-effectiveness of the projects logical and implementation models in procurement, management, distribution, and provision of WIFA supplementation and nutrition education to reach the target group.
- 3. Enhance the intake of WIFA supplementation among the target group.
- 4. Improve the Knowledge, Attitude and Practices (KAP) among adolescents in selected secondary schools and their key social influencers on WIFA supplementation (adolescent girls), and on nutrition, hygiene and, deworming (among both girls and boys).
- 5. Increase commitment from policy leaders to provide resources to, and creating the building blocks for integrated Programmes to scale.
- 6. Reduce prevalence of STH infection and decrease worm load.
- 7. Identify which adolescent nutrition Programme activities (such as advocacy, Programme planning, training, supply chain management, BCI, and others) would achieve greater health impacts and cost- and other- efficiencies through integration with similar deworming activities. Integration could involve co-location, co-delivery, joint advocacy, joint training, joint monitoring, etc.

Theory of Change for the Overall Project

Nutrition International intends DAWN to be a large-scale demonstration project which will assess secondary schools as a delivery platform for implementing a weekly iron and folic acid supplementation and nutrition education Programme for adolescents in Bangladesh. See Annex D for a logic model outlining DAWN components.

Activities of the Overall Project

The overall strategy focuses on demonstrating an integrated multi-sectoral approach to achieve the objectives of the Programme. NI aims specifically to provide information and recommendations to GoB about how best to implement its adolescent WIFA supplementation policy, including consideration of how to take into account significant variations in the iron content of water supplies in different parts of the country ('high and low iron' districts). NI's assistance to GoB will include reviewing its current WIFA guidelines with consideration for WHO's WIFA recommendation as well as providing recommendations on how to take into account significant variations in the iron content of water supplies in different parts of the country ('high and low iron' districts). NI will also work with J&J and other partners to share knowledge under the Blended Knowledge Partnership (BKP) about specific Programmematic aspects that offer synergies and scope for more direct integration.

The Programme model and evaluation will take into consideration the roll out of other Programmes such as deworming, and whether integration with such Programmes during any phase of Programme delivery would deliver additional health benefits or increase cost- or other-efficiencies.

The components of this integrated intervention are explained in Table 2:



Intervention	Activities	Target audience
WIFA	Provision of weekly iron-folic acid supplements	Adolescent girls in secondary schools
BCI	Changing the KAP of nutrition, WASH, and STH	Adolescent boys and girls, parents, school staff, and other stakeholders
WASH	Non-BCI partner contributions regarding water, sanitation, and hygiene	Adolescents in secondary schools
STH treatment	Biannual deworming treatments and activities in support of the national STH control and elimination Programme	Adolescents in secondary schools

Table 2: DAWN Project Intervention Package

Project location(s) & Site Selection

The study will be implemented within the period April 2018 through June 2019. It will be implemented in four districts of Rajshahi Division of Bangladesh. Two of these districts are high in ground water iron and two are low.

PART II: Details of the BCI Development

Overall objective of the Consultancy

The objective of this consultancy is to develop an evidence-based and interactive Behavior Change Intervention (BCI) strategy for the Bangladeshi context. This includes the development of behavior change communication tools and/or materials, intended to promote and disseminate accurate information regarding healthy and/or beneficial knowledge, attitudes, and practices while increasing the uptake of intervention among adolescents, and build awareness in the community and the relevant stakeholders. BCI materials are expected to have a high likelihood of effectiveness as they are to be supported by evidence and prior research.

Specific Objectives of the Consultancy

- 1. Design a behavior change strategy which will achieve coverage in all selected schools within DAWN districts, including tailored information for both girls and boys.
- 2. Develop, test, and implement a communication strategy and communication materials capable of effectively raising awareness of identified topics (below) while underscoring the importance of the Programme's activities (WIFA supplementation, de-worming activities, etc.).
- 3. Ensure the engagement of every level of stakeholders (adolescents, teachers, administrators, government bodies, and families/communities of adolescents) in the discussion and implementation of communication strategies (campaigns, meetings, workshops, discussion sessions, etc.).
- 4. Put in place a strategy for timely counseling and support to the target population of adolescent girls in order to increase adherence to the intervention. This support system should be capable of providing information to support knowledge and positive



- attitudes about the parts of the intervention, as well as able to suggest remedies for any side effects of any of the intervention components.
- 5. Achieve progress with respect to knowledge, attitude, and practice toward the predetermined indicators among the target population in the identified topics (below).

Topics to be covered by the BCI components

- **Nutrition**: Importance of adolescent nutrition, healthy/unhealthy foods, dietary diversity, iron-rich foods, healthy lifestyle, malnutrition.
- Anemia facts: What is anemia, causes of anemia/iron deficiency anemia, consequences of anemia, how to prevent anemia.
- WIFA: Why is it given, what does it contain, how to take it, what are the side-effects, what to do when there is a side effect, etc.
- **Deworming:** Why tablets are given, what they contain, how to take them, possible side-effects, what to do when there is a side effect, etc.
- WASH education: Safe water and sanitation practices, personal hygiene, menstrual hygiene, nutrition during menstruation, worm infestation (its cause, consequences, and prevention), etc.
- Sexual and Reproductive Health: Menstrual hygiene management (MHM).

Background and resources available

Nutrition International conducted a formative research as part of the development of the BCI which focused on a detailed understanding of the current situation regarding the target population's knowledge, attitudes, and practices (KAP) around WIFA supplementation, STH treatment, nutrition, and hygiene. NI also conducted other research on adolescent nutrition in Bangladesh, the results of which will be made available to the consultant/agency.

An implementation plan will be shared with the consultant/agency which will detail out the roles of individuals involved in the implementation.

A literature review conducted in 2017 as part of the formative research for the DAWN project included the following findings:

Current situation

- Prevalence of anemia among adolescents in Bangladesh varied between 30-40%.
- A significant proportion of adolescent girls in Bangladesh had inadequate knowledge about balanced diet and importance of taking extra food during adolescence. Also, a poor dietary practice along with food taboos was common.
- Overall, large majority of the study populations had correct knowledge around hygiene and sanitation. However, there were significant gaps between knowledge and practices around general hygiene.
- In Programme area, over one-third of the households were not aware of the deworming Programme in schools. More than half did not have adequate knowledge on prevention of STH infection through cleanliness and washing hands.
- Overall, vast majority of the adolescent girls did not know the causes and preventive measures of anemia. A significant proportion of the girls also did not know the sources of iron-rich food.



Impact of interventions

- Large-scale school-based WIFA, with or without deworming, among adolescent girls showed significant improvement in their iron status and reduced the burden of anemia.
- Education interventions in teenage girls showed a significant improvement of their knowledge about the causes and preventive measures of anemia.
- Coverage of STH treatment with deworming tablets among school children appeared to be low. Using WHO definition, coverage rate varied from 46-54%.
- Majority of the intervention studies involving nutrition education using various IEC materials showed a significant improvement in nutrition-related knowledge.
- Interventions involving health education demonstrated a considerable increase in knowledge and awareness about general hygiene and sanitation. However, there was a limited improvement in practices of hygiene and sanitation.

Strategies for success of WIFA Programme and Behavior change communication

- Active involvement of school teachers and school management committee increased the feasibility and acceptability of school-based WIFA Programme.
- Strong supervision and close monitoring of WIFA supplementation appeared to be essential factors for higher compliance and overall success of WIFA Programme.
- Regular counseling along with motivational strategies focusing on positive attributes of WIFA found to be effective in improving compliance.
- Family life education involving adolescent girls, parents, and caregivers increased the motivation of the girls and their families and thereby ensured the effectiveness of the Programme.
- Social mobilization involving teachers, health workers, and other stakeholders was an essential factor for ensuring the acceptability of the WIFA Programme and increasing the overall adherence and coverage.
- Health and nutrition education interventions with appropriate IEC materials and innovative interactive sessions improved the overall knowledge around diet and nutrition, general hygiene, and causes and prevention of anemia.

A qualitative study was also conducted in 2017 for the DAWN project to complement the results of literature review. This study collected primary data from adolescent girls and others on current KAPs regarding IFA, MDA, nutrition, hygiene, and sanitation. Results provide insight into the context and perceptions of nutrition and deworming in Bangladesh. A summary of findings is provided below:

KAP - Diet/Nutrition

- Adolescent girls and their parents had reasonable knowledge about nutritious/healthy food. Eggs, fruits, and vegetables were considered as healthy food. However, there were some misconceptions regarding healthy and unhealthy food.
- Nutrition was deemed to be essential for proper growth and the need for additional nutrition during adolescence was recognized by school teachers.
- School girls received nutrition related information mostly from the school curriculum and the electronic media.
- Most adolescent girls reported to consume a variety of foods such as fish, lentils, vegetables and seasonal fruits. Consumption of meat, milk and eggs were varied depending on the family's financial status. However, when menstruating girls avoided fish, meat and oily foods.
- During school time, some of the girls did not have breakfast and some consumed fast food or snack type foods for lunch. The girls seemed to prefer fast food and snack foods.



- A large majority of the adolescent girls said that fathers (men in the family) usually purchased the food, while mothers made the decision on what food would be purchased.
- Low income, poor knowledge regarding food value and balanced diet, and cultural beliefs appeared to be the major barriers in the consumption of nutritious food, and enjoyment of snacks is common

KAP – Malnutrition

- The majority of the respondents (other than adolescent girls and their parents) defined malnutrition correctly. Also, they had reasonable knowledge about the causes and consequences of malnutrition.
- According to the respondents, the majority of adolescents and their parents were unable
 to recognize malnutrition, especially mild and obtained advice only once the girls
 became sick.
- Some respondents said visiting traditional healers, and herbal medicines were more common practices for treating malnutrition. Some also mentioned iron and vitamin tablets were sometimes taken when prescribed by a doctor.

KAP - Water:

The majority of the adolescents had a reasonable knowledge about safe water and its sources. A large majority of the adolescents consumed tube-well water both at home and school as they believed tube-well water was a safe source of water.

KAP - Hygiene and Sanitation:

- The majority of the respondents had a reasonable knowledge about good sanitation and hygiene practices and their importance in good health.
- The majority of schools had sanitary latrines. However not all schools had safe drinking water or adequate sanitation facilities.
- The majority of girls did not use sanitary napkins and schools did not have facilities to support menstrual hygiene. There was a stigma surrounding the use of sanitary napkins. There was lack of knowledge regarding menstrual hygiene management in the school.
- The majority of the respondents practiced hand washing with soap after defecation and before taking meals. Most of the girls used sandals while moving around and going to the toilet. A large majority of the girls did not use school latrines because they were not always clean.
- Major barriers regarding general hygiene practices in schools included the lack of soap and safe water supplies and unclean toilets.

Knowledge and perception regarding anemia and its causes:

- The majority of the adolescent girls had poor knowledge about anemia and its causes; e.g., anemia and jaundice are perceived as the same
- The supplementation of iron tablets and the consumption of iron-rich foods were reported to be the measures for treatment and/or the prevention of anemia. However, only a few respondents considered iron-rich food as healthy food.

KAP - IFAs

• In general, there was inadequate knowledge about IFA and its benefit. Most of the girls and their parents perceived that IFA is required only by pregnant women. In some cases, parents did not let their daughter take iron tablets because they did not feel the necessity.



• Adolescents did not take IFA unless there were any symptoms of nutritional deficiency or they were advised by a health care provider.

KAP – STH/Deworming Tablets

- Most of the respondents knew about STH infection and their causes, and the importance of deworming tablets.
- Some parents were reluctant to take free deworming tablets provided by the government facilities or by other organizations. Girls were also reluctant to take deworming tablets because of their smell and bad taste. Some reported taking the deworming tablets when it was prescribed by the doctors, and they preferred to buy this from the pharmacy.
- Fear of side effects was found to be barrier to poor compliance of deworming tablets.

Aside from the formative research, additional resources have been gathered to inform the consultant/agency and which may feed into the BCI development process.

Key Considerations for the BCI Strategy from the Formative Research

Promotion of intervention:

- Respondents from all categories stated that promotional activities are essential to create awareness about anemia and its consequences and to raise the capacity for accurate perception of the benefits of the intervention among the adolescent girls and their families.
- Respondents also stated that the promotional activities should focus on the motivational aspects: explaining benefits from the WIFA and deworming tablets that appeal to adolescent girls and accurately describing and reinforcing the girls' specific need for the interventions. Similarly, specific messaging will be required to counteract the reluctance to take tablets/medication in the absence of any obvious symptoms.
- O Some mediums suggested to achieve this include:
 - o public announcements
 - o periodic stakeholder meetings
 - o workshops and discussion sessions with the girls and their parents
 - o distribution of leaflets (or, preferably, an infographic and letter of endorsement by MoH and school authorities)
 - o electronic media
 - education-through-entertainment (e.g. documentary, drama, cultural Programme)
 - o banners at the schools which could say "We take WIFA on XX day" and may include a campaign slogan as well
 - home visits

It is recommended that these promotional activities involve teachers, school management committees, and other stakeholders in order to sensitize the community to aspects of the Programme before implementation and increase likelihood of uptake.

Addressing specific concerns:



- O Some recent media reports about children becoming sick after deworming have led to fear of side effects from STH treatment; it will be important to counter these messages and address the potential lack of compliance due to feared side effects. Also, BCI materials on WIFAS and deworming may need to be branded slightly differently so that the negative perception of deworming does not carry over to WIFAS.
- O Some respondents raised concerns over the poor quality of IFA and deworming tablets from previous experiences, citing an unpleasant taste or smell. Since the tablets provided as part of DAWN will be enteric-coated, BCI materials should emphasize the increased quality over tablets which participants may have previously received. Testimonials may also be provided to assure the participants that the tablets do not have an unpleasant taste and/or odor.
- There is a perception among some that "free supplements" from government or non-government organizations are of lower quality because the tablets previously provided were not packaged in strips. The BCI materials should inspire trust in the quality WIFA supplements, and clearly indicate that the tablets being provided under DAWN are packaged in strips in order to add to their appeal.
- At both the family and individual level, respondents expressed concern for the lack of awareness of the importance of the interventions among the participants' family members, in particular elder family members. Respondents indicated that this lack of awareness might result in elder family members disallowing the adolescent girls in their families to take the tablets. The BCI strategy should address this concern.

Sustainability

On the institutional level, Programme sustainability will rely in part on continued use of designed BCC materials. On the individual level, regular counseling of the adolescent girls involving BCC (preferably in the presence of their mothers) and focused on the positive attributes of WIFA that appeal to adolescent girls should be in place to improve the compliance.

Additional Considerations

• As the tablets will be consumed at school, it will be important for students to have access to clean drinking water. As not all schools can supply this, messaging around bringing clean water to school from home may have to be incorporated in BCI materials.

Methodology and Data

The consultant/agency will collaborate with representatives at IPHN for the development and approval of BCI materials for DAWN. The consultant/agency will be provided with the following documents as resources for this purpose, and will be expected to develop integrated BCI materials drawing from each of them:

- Formative research (literature review and qualitative study) as described above
- BCI material from Children Without Worms (CWW), the global technical partner of Johnson's (J&J) in Bangladesh
- Materials from experts in WASH to be incorporated into the DAWN BCI (from implementing partner, to be confirmed)
- Materials from work on another NI initiative in Bangladesh called INBP (Integrating Nutrition into BRAC Programmes)
- Information on Menstrual Hygiene Management (MHM)



- NI's BCI toolkit (step-by-step guidance for the development, implementation, monitoring, and evaluation of your BCI strategy)
- Any other materials as provided, including those from IPHN

Proposed Deliverables

- 1. A summary of all relevant information (including material provided by NI) relating to BCI for DAWN
- 2. A plan for development of BCI materials in collaboration with IPHN which integrate smoothly into the DAWN Programme, inclusive of messaging tailored to adolescent girls, boys, teachers/school administrators, families, and communities
- 3. Draft version of BCI materials with initial approval from NI
- 4. Approved draft version of BCI materials tested in the field
- 5. Final version of comprehensive BCI materials
- 6. Training module for BCI materials
- 7. A detailed operationalization/implementation plan
- 8. A detailed Final Report (in Bengali and English)

Timeline

Insert an expected timeline for the project. The timeline should clearly indicate the expected activities by weeks and deliverables for each individual involved in the current project.

Total Budget

The respondent should provide a detailed budget for this work, following the template included in Annex B.

Annex B. BUDGET TEMPLATE

	Particulars	Person Days	Rate	Remarks
A	SALARIES/PROFESSIONAL FEES			
A1	Professionals			
A2	Field Staff/Consultant/Agency			
	Sub Total of A			
В	TRAVEL, TRANSPORTATION (Vehicle Expenses/Local Conveyance			
B1	Local Conveyance for field work			



B2	Local Conveyance for Professional Staff
В3	Local Conveyance for Field Researchers
	Sub Total of B
C	In-Country Travel (Travel expenses for Professional staff from base station to states/districts:
C1	Air Travel
C2	Train Travel
	Sub Total of C
D	DAILY ALLOWNACE/LODGING EXPENSES
D1	Professional staff
D2	Field researcher
	Sub Total of D
E	OFFICE EXPENSES
E1	Stationary
E2	Communication & any other
	Sub Total of E
F	MEETING EXPENSES
F1	Consultation workshop cost
	Sub Total of F
	TOTAL OF DIRECT COST (A to F)
G	Management Cost% on Total Direct Cost
Н	Service Tax (@15%) on Total Direct Cost & Management Cost
I	Total (A to F)+G+H

Annex C. DECLARATION FORM

"We have examined the information provided in your Request for Proposals (RfP) and offer to undertake the work described in accordance with requirements as set out in the RfP. This proposal is valid for acceptance for 6 months and we confirm that this proposal will remain binding upon us and may be accepted by you at any time before this expiry date."

"We accept that any contract that may result will comprise the contract documents issued with the RFP and be based upon the documents submitted as part of our proposal.

"Our proposal (Technical and Financial) has been arrived at independently and without consultation, communication, agreement or understanding (for the purpose of restricting



competition) with any other Respondent to or recipient of this RFP from the Nutrition International.

"All statements and responses to this RFP are true and accurate."

"We understand the obligations regarding Disclosure as described in the RFP Guidelines and have included any necessary declarations."

"We confirm that all personnel named in the proposal will be available to undertake the services."

"We agree to bear all costs incurred by us in connection with the preparation and submission of this proposal and to bear any further pre-contract costs.

"I confirm that I have the authority of [insert name of organization] to submit this proposal and to clarify any details on its behalf."

Name:
Title:
Date:
Signature:



Annex D. PROGRAMME LOGIC MODEL

