Strategies	Description	Responder 1 (I1) Do you agree? (Y= Yes, N= No)	Responder 1 (I2) Do you agree? (Y= Yes, N= No)	Responder 1 (I5) Do you agree? (Y= Yes, N= No)	Responder 2 (I6) Do you agree? (Y= Yes, N= No)	Responder 3 (I8) Do you agree? (Y= Yes, N= No)	Responder 1 (I9) Do you agree? (Y= Yes, N= No)	Responder 4 (I10) Do you agree? (Y= Yes, N= No)	Responder 5 (I11) Do you agree? (Y= Yes, N= No)	Responder 6 (I12) Do you agree? (Y= Yes, N= No)
Strategy 1: Adding new features to extract and/or meet farmers' values	Example: Features to collect feedback, to analyze market price, to assess profit, online buy/sell, to add hotline number for consultancy, to add videos on crop diseases, prevention, and remedies.	Y	Y (I think all values mentioned here are important. But integrating those values incur extra cost in agri app development which will be very important factor in Bangladesh)	Y	Y	Y	Y	Y	Y	Y (May Consider adding entertainment info to make it more friendly)
Strategy 2: Adding concise and customized information/contents	Example: information on post-harvesting and processing, weather prediction, agriculture advice with weather information, applying fertilizers, crop preservation, varieties of seeds, soil fertility, and pest control.	Y	Y	Y	Y	Y	Y	Y	Y	Y (Can use video (low resolution) or info graphics)
Strategy 3: Updating agriculture information regularly	Regular updates based on Bangladeshi female farmers' requirements and values are necessary to make the apps more helpful for them.	Y	Y	Y	Y	Y	N (Bangladeshi female farmers' are not dedicated farmer, they are working as assistant for their father, brother or husband)	Y	Y	Y (Simple alert/notification on updated information)
Strategy 4: Enhancing developers' non-technical knowledge	It is also difficult to identify the values of farmers and explore the process of addressing their values in agriculture apps with technical knowledge only. Therefore, developers also need to enhance their non-technical knowledge, particularly psychological and social knowledge.	N (In my experience it is a pre-requisite for developer. Otherwise, the developer should not be developing it.)	Y	Y (To enhance this non-technical knowledge the develop should visit the area and learn about the local socio-cultural and economical context.)	Y	Y	Y	Y	Y	N (Developers should only follow the program team (Domain expert) guidelines and use their tech expertise)
Strategy 5: Changing developers' and farmers' mindset	It is a usual practice that developers are not involved directly in farmers' values extraction and/or addressing those values in app development. This is possible for them if they develop a mindset to help farmers. On the other hand, many female farmers are still afraid of using apps. They should gradually develop a mindset of using agriculture apps.	N (In my experience it is a pre-requisite for developer. Otherwise, the developer should not be developing it.)	Y	Y (To influence the female farmers to use more technology in agriculture, the tech should be user friendly and easily accessible)	Y	Y	Y	Y	Y	Y (Can only focus on changing mindset of female farmers with strong communication plan)
Strategy 6: Applying human-centered approaches to elicit values	Example: Observations, asking non-scientific questions, employing the bottom-up approach, employing the design thinking method, and using A/B testing.	Y	Y	Y	Y	Y	Y	Y	Y	Y (But Sometimes the female farmers don't know about innovation or new technology so bottom up approach don't work everywhere)
Strategy 7: Prioritizing female farmers' values	Prioritizing values based on the requirements of the farmers is important. For example, if a farmer has a list of 20 desired values, a few are the most important to them. During app development, the most important values should get superiority to be addressed.	N (The app can't be emphasis on some particular values. It should focus on maximum number of generic values women farmers may try to seek.)	Y	Y (And the most important values varies in different place, that also should be considered by the developer.)	Y	Y	Y	Y	Y	Y
Strategy 8: Reducing the communication gap between farmers and developers	It is not common for developers to practice 'field visit,' which may result in the communication gap between the developers and the farmers. As a result, the developers do not realize the values of the farmers and, therefore, cannot address their values in apps as well.	N (If human-centric approach is there, it is automatically be there. No extra effort should be there.)	Y	Y	Y	Y	N	Y	Y	N (Usually an interface (organization) work to bridge between farmer and developer. They can reduce the gap. Since developers don't have domain knowledge, they can visit field but can't contribute much)
Strategy 9: Customizing apps based on user literacy levels	As most of the Bangladeshi female farmers are less-educated and some are even uneducated, the apps should be designed based on the farmers' literacy levels and customized in a way that is easier for them to use.	Y	Y	Y (Local language should be used)	Y	Y	Y	Y	Y	Y (More graphical interface and visually attractive)
Strategy 10: Considering Bangladeshi culture when developing apps	Respecting culture is essential for the people of conservative societies like Bangladesh. The apps that are not aligned with Bangladeshi culture may not be considered satisfactory by female farmers.	Y	Y	Y	Y	Y	Y	Y	Y	Y (Graphics as well as can add music (Local popular instruments))
Strategy 11: Engaging users in all steps of apps development	The development teams should include users in all steps of the software development life cycle, which will help them understand the users' values and incorporate those values in app development.	Y (Agile development framework should be there to maintain this. Regular water-fall approach can't handle this issue.)	Y	Y	N (Engaging users in all steps of apps development may not be feasible in terms of resource and financial perspective. However, their representatives can be engaged in some steps)	Y	Y	Y	Y	Y (Usually application development is a very structured process, can't go like learning by doing. So pre-development engagement may work to validate)
Strategy 12: Taking feedback in person regularly	If developers or field facilitators visit the farmers and discuss what they need, that would help the developers understand what actually their requirements and values are and work accordingly.	Y	Y	Y	Y	Y	N (Very difficult to manage in real scenario)	Y	Y	Y (Have to consider the feasibility (RoI))
Strategy 13: Establishing a dedicated team/person for values concerns	Example: A new role or team should take regular feedback, analyze the feedback from the values' lens, and work on those accordingly while developing apps.	Y	Y	Y	Y	Y	Y	Y	Y	Y (Have to consider the feasibility (RoI))
Strategy 14: Adjusting existing roles and responsibilities	Example: field visits by product managers, developers, and other stakeholders would better understand farmers' values and address those in apps. Furthermore, the product owner and UX designer need to understand the term "values" and address those values in apps.	Y	Y	Y	N (The developers do not necessarily require field visit. However, someone (e.g System Analyst) could work on behalf of them to collect requirements that address 'values')	Y	Y	Y	Y	Y (Need to orient the stakeholders)