## The Journal of Physical Therapy Science



## Original Article

# Possible solutions to enhance evidence-based practice proposed by rehabilitation professionals in Japan: a Delphi study

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Abstract. [Purpose] We aimed to identify possible solutions to enhance evidence-based practice (EBP) in rehabilitation professionals in Japan. [Participants and Methods] A three-round Delphi method was undertaken among a cohort of clinical therapists (328 physical therapists, 55 occupational therapists, and 6 speech therapists). In the first round, the participants listed possible solutions for promoting EBP, other than 12 solutions presented in a previous study; subsequently, a new list was created. In the second round, a newly-created list of solutions was presented, and the participants responded on a 5-point Likert scale on how much they agreed with the solutions promoting EBP in Japanese rehabilitation professionals. In the third round, the distribution of responses obtained in the second round was presented, and participant's agreement was again assessed on a 5-point Likert scale. [Results] Across the three rounds, data were collected from 33.7% to 47.0% of all eligible participants. After the first round, 17 possible solutions were developed, and a list of 29 solutions was used in the second round. After the third round, 10 solutions reached the predetermined criteria for consensus. [Conclusion] In this study, ten possible solutions to promote EBP were proposed by the Japanese rehabilitation professionals.

Key words: Consensus development, Education, Health professions

(This article was submitted Aug. 18, 2022, and was accepted Oct. 3, 2022)

## INTRODUCTION

Evidence-based practice (EBP) is an important component of high-quality patient care<sup>1)</sup>. Generally, implementation of EBP is positively accepted by rehabilitation professionals; however, some barriers have been documented such as lack of time, skills and research knowledge<sup>2-5)</sup>. The barriers are influenced by the state of the training process for rehabilitation professionals and the healthcare system in each work setting<sup>4</sup>); therefore, the barriers and their solutions need to be analyzed in accordance with the conditions in each work setting.

Although previous studies have identified a range of barriers<sup>2–5</sup>), there are few recommendations for specific solutions to overcome these barriers. A previous systematic review<sup>4)</sup> proposed attitude towards involvement in research activities as a possible facilitator of implementation of EBP into clinical practice using a survey among Australian physical therapists (PTs) 6. However, this is only a personal factor and not a solution to overcome barriers to the implementation of EBP in clinical practice. Recently, Alrowayeh et al. 71 undertook semi-structured interviews with seven PTs in director positions for exploring solutions from not only personal but also social perspectives to overcome barriers to the implementation of EBP. The researchers<sup>7)</sup> proposed 12 potential solutions to overcome barriers. However, this study<sup>7)</sup> was undertaken in Kuwait and it is unknown whether the findings are applicable in other countries. Further, it is uncertain whether solutions proposed by a limited participants are accepted by a target population.

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A single survey is a convenient way to determine the extent to which many clinical therapists agree with the listed solutions. However, this method does not allow respondents to incorporate newly discovered solutions or to modify their own opinions by considering the views of others. A multi-staged anonymous survey which attempts ultimately to achieve consensus on an important issue is called the Delphi method<sup>8, 9)</sup>, and the use of this method for all clinical therapists of a certain association would provide an understanding of possible solutions that could be followed by the majority of therapists. Such solutions may be promising for promoting future acceptance into the clinical practice and thus would be useful for planning an implementation study in the future.

This study aimed to develop a list of possible solutions for promoting EBP in the rehabilitation profession in Japan, through iterative Delphi consultation with and consensus by Japanese rehabilitation professionals.

#### PARTICIPANTS AND METHODS

The inclusion criteria of the participant were as follows: (1) members of the Japanese Society of Allied Health and Rehabilitation among rehabilitation professionals, which is one of the largest associations of PTs, occupational therapists (OTs), and speech therapists (STs) in Japan, and (2) those who were currently undertaking clinical work as a PT, OT, or ST. Members affiliated with educational or research institutions were excluded. This study was approved by the Institutional Research Committee of Saitama Prefectural University (#20098).

This study used the three-round Delphi method. Although this method has no guidelines for the number of rounds and scale for agreement, this study used three rounds, as suggested by previous studies<sup>10, 11)</sup>. During all three rounds, all eligible participants were asked to respond to an anonymous paper survey, where data were collected for two weeks in each round. In the third round, the participants were allowed to change their opinions based on the overall distribution of responses in the second round.

Before the first round, six barriers to implementation of evidence-based practices and 12 possible solutions to these barriers, as described in the study of Alrowayeh et al.<sup>7)</sup>, were partially modified by changing from PTs to PTs/OTs/STs and a list was developed (List 1) (Supplementary material 1).

In the first round, from July to August 2021, a researcher (TU) sent the list to all eligible participants and the participants were asked to list, in free text, other ideas for possible solutions for promoting EBP in the rehabilitation profession in Japan. Further, to understand demographics, the participants were asked about the following as per a previous study<sup>12)</sup>: gender, the highest degree (career college, junior college, college, master's degree, and doctoral degree), clinical experience as a therapist (<3 years, 3–5 years, 6–10 years, 11–15 years, 16–20 years, and >20 years), and the number of therapists at work (<3 people, 3–5 people, 6–10 people, 11–15 people, and >16 people). Subsequently, the ideas of the participants were independently analyzed by three assessors with different backgrounds (HT, TU, and YM) by rephrasing, combining, and separating constructs to better represent solutions<sup>13)</sup>. One assessor (HT) was an author who was experienced in the Delphi method, qualitative study, and research on EBP, and a clinical PT with a degree of Doctor of Philosophy in Physical Therapy. Another assessor (TU) was another author who was a clinical PT with a degree of Master of Science in Rehabilitation Science. The other assessor was an undergraduate student in physical therapy. The initial list that had been independently created was posteriorly discussed, and a final one was developed following the consensus of the three assessors. Consequently, the newly created list of possible solutions, including the ones shown in the 1st round, was developed (List 2) (Supplementary material 2).

In the second round, from September to October 2021, a researcher (TU) sent the List 2 to all eligible participants and the participants were asked to respond on a 5-point Likert scale (1=strongly disagree, 2=disagree, 3=neither agree nor disagree, 4=agree, and 5=strongly agree)<sup>14, 15)</sup> about how much they agreed with the solutions of promoting EBP in the rehabilitation profession in Japan. The distribution of responses was calculated and a list with the solutions and corresponding pie chart of response distributions was developed (List 3) (Supplementary material 3).

In the third round, from October to November 2021, a researcher (TU) sent the List 3 to all eligible participants and the participants were asked to respond on a 5-point Likert scale about how much they agreed with the solutions of promoting EBP in the rehabilitation profession in Japan again.

Although there are no standardized criteria for the consensus, we used the following criteria according to a previous study<sup>16</sup>: a mean score of  $\ge 3.5$ , a median score of  $\ge 4$ , a percent agreement (agree or strongly agree ratings) of  $\ge 70\%$ , and a coefficient of variation of  $\le 20\%$ . Name of barriers corresponding to the solutions had been independently created based on the previous study<sup>7</sup>) was posteriorly discussed, and a final one was developed following the consensus of the three authors.

## **RESULTS**

Eligible participants were 389 therapists (328 PTs, 55 OTs, and 6 STs) in each round. Responses were obtained from 167 (42.9%), 183 (47.0%), and 131 (33.7%) participants in the first, second, and third rounds, respectively (Table 1). For the agreement, 30 and 6 missing data were noted in the second and third rounds, respectively, for which no data imputation was undertaken.

Table 1. Summary of the participants in the first round

Item	Responses, n (%)			
Gender	Male, 110 (65.9%)			
	Female, 57 (34.1%)			
Highest degree	Career college, 76 (45.5%)			
	Junior college, 1 (0.6%)			
	College, 81 (48.5%)			
	Master's degree, 9 (5.4%)			
	Doctoral degree, 0 (0%)			
Clinical experience as a therapist	<3 years, 20 (12.0%)			
	3-5 years, 62 (37.1%)			
	6-10 years, 33 (19.8%)			
	11-15 years, 26 (15.6%)			
	16-20 years, 17 (10.2%)			
	20+ years, 9 (5.4%)			
Number of therapists at work	<3 people, 4 (2.4%)			
	3-5 people, 1 (0.6%)			
	6-10 people, 7 (4.2%)			
	11-15 people, 6 (3.6%)			
	16+ people, 149 (89.2%)			

In the first round, 14 participants nominated eligible comments, and a list of 17 solutions was created as a result of the consensus meeting (Table 2). Consequently, a list of 29 solutions was used in the second round. Table 3 presents the results in the second round, where corresponding seven barriers including a newly developed category of lack of promotion of EBP were also described. As a result of the third round, 10 solutions from five out of seven barriers reach the predetermined criteria for consensus (Table 4). Possible solutions corresponding to one of the most commonly nominated barriers of busy staff schedule<sup>2–5)</sup> did not reached the predetermined criteria for consensus.

## **DISCUSSION**

Several hypotheses had been proposed by researchers for solutions to promote EBP<sup>6, 7)</sup>, but to our knowledge, this is the first study to explore possible solutions that can be agreed on among rehabilitation professionals. Ten out of 29 solutions that corresponded to seven barriers reached the predetermined criteria for consensus. Interestingly, possible solutions corresponding to one of the most commonly nominated barriers of busy staff schedule<sup>2–5)</sup> were not retained in the 10 possible solutions. Although possible solutions for need for proper management were major solutions retained after the third round, at least one possible solutions were retained among five out of seven barriers.

The 10 solutions for which consensus was reached seemed to have one thing in common: EBP education. It was in 2019 that EBP education was explicitly stated in the Japanese educational curriculum for PTs and OTs<sup>17, 18)</sup>, who comprise the majority of the participants of this study. Large surveys show that PTs<sup>12)</sup> and OTs<sup>19)</sup> lack efficacy in implementing EBP with limited education. Furthermore, the 10 consensus suggests that educational methods range from the creation of opportunities for individuals to enhance their abilities ("improving communication skills with medical staffs, patients, and academic PTs/ OTs/STs", "offering continuous support", "gradually applying new practices in therapists to ensure accuracy, completeness, and continuance", "setting up training sessions and workshops that do not specify a place or time", and "observing how people are actively implementing EBP (e.g. medical doctors)"), to the enhancement of awareness promoting activities ("promoting awareness among therapists of the concept of EBP and the objective usefulness of practice guidelines as a tool to implement EBP", "making information on EBP and practice guidelines more publicly available to therapists and patients", and "holding awareness sessions to motivate staff and increase their willingness to provide the best care to patients"), and to the enhancement of EBP in undergraduate education ("making students of healthcare professionals strongly aware of the need for EBP from training school stage"). These results indicate that there is a perceived need for enhanced EBP education in the rehabilitation profession in Japan. Moreover, it is interesting to note that the participants mentioned a subsidy scheme from an association or other to support EBP learning ("establishing an association or other subsidy scheme to create opportunities to learn about EBP at the workplace"). It can be assumed that rehabilitation professionals in the clinical practice consider the improvement of the environment led by educational institutions and training associations to be important for the promotion of EBP in Japan. Previous research has highlighted an association between prior research experience and a clinician's integration of EBP into practice. A survey among Australian PTs suggested that a possible facilitator of implementation

Table 2. Comments and final expressions that reached a consensus

#### Comment from the participants

Make information and practice guidelines on EBP more accessible to therapists and patients. For example, subscription to email newsletters and distribution of paper materials if each workplace wishes to do so.

It would be good if there were financial subsidies for hospitals to create opportunities to learn about EBP, and if more continuing education points were given to those who attended EBP workshops, or if more points were given to those who held workshops for staff at their hospitals after the workshops participation.

It would be good if the concept of EBP and the objective usefulness of practice guidelines as a tool to implement EBP could be widely dissemi-

It would be good to create a system where we are evaluated according to our EBP implementation.

It would be good to have incentives for those who can implement EBP and to have a qualification to teach EBP.

It would be good if accredited persons close to us, such as on YouTube, could give a more accessible form of information about EBP to the public.

It would be good to see the doctor's practice.

I think it is important to collect and summarize the evidence, but I also think it is important for us as a country (or as an association) to develop the evidence.

It would be good to have an app that is casually available to help EBP implementation.

Training sessions and workshops should be easy to attend. They should not Setting up training sessions and workshops that do not be specific in location or time. In order to "reduce work," specific rules are always necessary. Unless the rules to reduce work are clearly presented, and it is confirmed that they are being implemented, there will be absolutely no room for therapists to implement EBP. Currently, the direct benefits of "providing the best possible care to patients" and "implementing EBP" are limited for therapists. I want people to understand that we work to make a living first and foremost.

Since my working hours are limited to clinic hours, I have little time to practice and learn EBP. I would like to eliminate the requirement of 18 units of clinic time per day and increase the time for EBP implementation.

By providing information to the public widely through TV, newspapers, magazines, etc., we will create a mood that it is strange that EBP is not being implemented (move public opinion). It would be good to make it possible for those who receive medical care to evaluate those who provide it.

If the income does not increase, the quality of PT will continue to decline. Too many people say there is no point in studying.

It is important to strongly emphasize the need for EBP in training schools.

Expressions that reached a consensus

Making information on EBP and practice guidelines more publicly available to therapists and patients

Establishing an association or other subsidy scheme to create opportunities to learn about EBP at the work-

Creating a system that allows us to get Continuing Education points not only when we attend EBP workshops, but also when we subsequently hold transmitter workshops at our workplaces

Promoting awareness among therapists of the concept of EBP and the objective usefulness of practice guidelines as a tool to implement EBP

Creating a system to quantify the extent to the EBP implementation, so that as adherence increases, each employee is evaluated in the workplace accordingly

Creating a system to quantify the extent to the EBP implementation, so that as adherence increases, each employee is evaluated in the workplace accordingly

Creating a qualification to teach the EBP implementa-

Representing information on EBP by well-known persons through accessible media (e.g. YouTube) in a format that everyone can understand

Observing how people are actively implementing EBP (e.g. medical doctors)

Strengthening efforts by associations and other organizations to promote research activities that demonstrate the benefits of healthcare services to promote EBP

Developing apps that are useful for EBP implementa-

specify a place or time

Creating specific workplace rules to reduce clinical workloads in order to afford EBP implementation

Reducing the amount of time for clinical work to afford the implementation of EBP

Creating public awareness that implementing EBP is essential by widely highlighting EBP usefulness in mass media such as TV, newspapers, and magazines

Enabling patients to understand the quality of healthcare services with respect to the level of EBP implementation

Creating a system to quantify the degree of EBP implementation and to increase healthcare fees from the government according to the degree of compliance

Making students of healthcare professionals strongly aware of the need for EBP from training school stage

EBP: Evidence-based practice.

Table 3. Results in the second round among the 183 participants

Corresponding barriers	Possible solutions of promoting EBP in the rehabilitation profession in Japan	Strongly disagree	Disagree	Neither agree nor disagree	Agree	Strongly agree
Busy staff schedule	A formal decision from the upper management to authorize and include EBP in PT/OT/ST	2	13	45	35	5
	Creating specific workplace rules to reduce clinical workloads in order to afford EBP implementation	1	15	45	46	8
	Time management (e.g., assigning less work to two therapists so that they can perform EBP tasks)	2	10	30	49	9
	Reducing the amount of time for clinical work to afford the implementation of EBP	6	26	38	27	3
Lack of communication skills of some therapists	Improving communication skills with medical staffs, patients, and academic PTs/OTs/STs	0	6	14	56	24
	Running awareness campaigns to improve collaboration among medical staff and with patients to increase patient confidence	3	14	41	34	8
Need for proper management	Gradually applying new practices in therapists to ensure accuracy, completeness, and continuance	0	1	25	65	9
	Offering continuous support	1	2	23	64	10
	Setting up training sessions and workshops that do not specify a place or time	1	2	23	60	14
	Creating a qualification to teach the EBP implementation	2	7	55	32	4
	Observing how people are actively implementing EBP (e.g. medical doctors)	1	5	31	54	9
	Establishing an association or other subsidy scheme to create opportunities to learn about EBP at the workplace	1	4	29	51	15
	Developing apps that are useful for EBP implementation	2	8	28	52	10
	Strengthening efforts by associations and other organizations to promote research activities that demonstrate the benefits of healthcare services to promote EBP	0	3	37	51	9
Lack of motivation	Offering incentives at early stages	5	12	33	40	10
	Holding awareness sessions to motivate staff and increase their willingness to provide the best care to patients	2	5	30	53	10
	Creating a system to quantify the extent to the EBP implementation, so that as adherence increases, each employee is evaluated in the workplace accordingly	4	9	39	40	8
	Creating a system that allows us to get continuing education points not only when we attend EBP workshops, but also when we subsequently hold transmitter workshops at our workplaces	3	9	32	49	7
	Creating a system to quantify the degree of EBP implementation and to increase healthcare fees from the government according to the degree of compliance	2	9	33	42	14

Values are presented in the proportion of the 183 participants.
EBP: Evidence-based practice; PT: physical therapist; OT: occupational therapist; ST: speech therapist.

Table 3. Continued

Corresponding barriers	Possible solutions of promoting EBP in the rehabilitation profession in Japan	Strongly disagree	Disagree	Neither agree nor disagree	Agree	Strongly agree
Lack of interest in adding new practices	Making students of healthcare professionals strongly aware of the need for EBP from training school stage	1	3	26	52	18
	Arranging workshops, local or abroad, for those staff who are willing to gain EBP knowledge and skills	0	5	28	58	9
	Organizing awareness sessions for staff to high- light the positive outcomes of EBP	1	7	34	52	6
	Promoting awareness among therapists of the concept of EBP and the objective usefulness of practice guidelines as a tool to implement EBP	0	1	20	64	15
Lack of promotion of EBP	Making information on EBP and practice guide- lines more publicly available to therapists and patients	0	5	22	60	13
	Representing information on EBP by well-known persons through accessible media (e.g. YouTube) in a format that everyone can understand	2	9	35	45	9
Patient attitudes	Involving patients in the treatment process	1	8	31	47	13
	Developing awareness guidelines about EBP for patients and disseminate them through bulletin boards, brochures, and roll-up banners	0	8	43	43	6
	Creating public awareness that implementing EBP is essential by widely highlighting EBP usefulness in mass media such as TV, newspapers, and magazines	2	11	44	35	8
	Enabling patients to understand the quality of healthcare services with respect to the level of EBP implementation	0	5	37	50	8

of EBP into clinical practice was an attitude towards involvement in research activities<sup>6</sup>). A survey among 843 clinical nurses at two university hospitals in Japan using the Evidence-Based Practice Questionnaire<sup>20</sup>) demonstrated that experience with ≥2 research activities contributed to the scores of the Evidence-Based Practice Questionnaire<sup>21</sup>). Thus, encouraging research activities may promote EBP in clinical settings in Japan, and further research is needed to determine which research activities may be beneficial in changing attitudes toward the implementation of EBP in clinical settings.

It is also interesting to note that solutions that correspond to certain barriers were not supported to a consensus threshold by the participants in this study. First, for example, the barrier of busy staff schedule was a barrier proposed in the previous study<sup>7)</sup>, and two corresponding solutions were nominated. Two newly proposed solutions ("creating specific workplace rules to reduce clinical workloads in to afford EBP implementation" and "reducing the amount of time for clinical work to afford the implementation of EBP") would be associated with this barrier. However, these possible solutions did not reach a threshold of consensus in this study. Further, no solution can be considered to be related to reward oneself was reached by consensus ("creating a system to quantify the degree of EBP implementation and to increase healthcare fees from the government according to the degree of compliance", "creating a system to quantify the extent to the EBP implementation, so that as adherence increases, each employee is evaluated in the workplace accordingly", and "offering incentives at early stages"). Furthermore, a newly proposed solution of "creating public awareness that implementing EBP is essential by widely highlighting EBP usefulness in mass media such as TV, newspapers, and magazines" did not reach the consensus. These results may indicate that building a system to simply secure time or to directly or indirectly impose the implementation of EBP is not required in Japan. Second, two solutions that were categorized in the lack of interest in adding new practices in the previous study<sup>7)</sup> did not reach a threshold of consensus. Patient attitudes were another barrier proposed in the previous study<sup>7)</sup> and two corresponding solutions were nominated. Two newly proposed solutions ("enabling patients to understand the quality of healthcare services with respect to the level of EBP implementation" and "running awareness campaigns to improve collaboration among medical staff and with patients to increase patient confidence") would also be associated with a content

Table 4. Results in the third round among the 131 participants

Possible solutions of promoting EBP in the rehabilitation profession in Japan	Percent agreement (agree or strongly agree ratings)	Average	Median	Coefficient of variation
Improving communication skills with medical staffs, patients, and academic PTs/OTs/STs†	92.4	4.0	4.0	10.9
Promoting awareness among therapists of the concept of EBP and the objective usefulness of practice guidelines as a tool to implement $EBP^\dagger$	84.7	3.9	4.0	13.6
Making information on EBP and practice guidelines more publicly available to therapists and patients <sup>†</sup>	84.0	3.9	4.0	13.1
Offering continuous support <sup>†</sup>	83.2	3.9	4.0	13.1
Gradually applying new practices in the rapists to ensure accuracy, completeness, and continuance $^\dagger$	83.2	3.9	4.0	13.7
Setting up training sessions and workshops that do not specify a place or time $\ensuremath{^\dagger}$	81.7	3.9	4.0	15.7
Observing how people are actively implementing EBP (e.g. medical doctors) $\!\!\!^{\dagger}$	77.1	3.8	4.0	17.0
Making students of healthcare professionals strongly aware of the need for EBP from training school stage $^\dagger$	77.1	3.8	4.0	15.9
Holding awareness sessions to motivate staff and increase their willingness to provide the best care to patients $^{\dagger}$	74.0	3.7	4.0	17.4
Establishing an association or other subsidy scheme to create opportunities to learn about EBP at the workplace $^\dagger$	70.2	3.7	4.0	16.3
Developing apps that are useful for EBP implementation	69.5	3.7	4.0	16.0
Arranging workshops, local or abroad, for those staff who are willing to gain EBP knowledge and skills	67.2	3.7	4.0	17.4
Time management (e.g., assigning less work to two therapists so that they can perform EBP tasks)	65.6	3.6	4.0	19.8
Strengthening efforts by associations and other organizations to promote research activities that demonstrate the benefits of healthcare services to promote EBP	64.9	3.6	4.0	16.3
Enabling patients to understand the quality of healthcare services with respect to the level of EBP implementation	64.9	3.7	4.0	15.9
Involving patients in the treatment process	64.1	3.7	4.0	18.2
Representing information on EBP by well-known persons through accessible media (e.g. YouTube) in a format that everyone can understand	62.6	3.6	4.0	19.1
Creating a system to quantify the degree of EBP implementation and to increase healthcare fees from the government according to the degree of compliance	61.8	3.6	4.0	19.1
Organizing awareness sessions for staff to highlight the positive outcomes of EBP	60.3	3.6	4.0	17.9
Creating specific workplace rules to reduce clinical workloads in order to afford EBP implementation	59.5	3.5	4.0	22.2
Creating a system that allows us to get continuing education points not only when we attend EBP workshops, but also when we subsequently hold transmitter workshops at our workplaces	56.5	3.5	4.0	19.5
Developing awareness guidelines about EBP for patients and disseminate them through bulletin boards, brochures, and roll-up banners	53.4	3.6	4.0	17.5
Creating a system to quantify the extent to the EBP implementation, so that as adherence increases, each employee is evaluated in the work-place accordingly	45.0	3.4	3.0	19.5

†Solutions reached the pre-determined criteria for consensus. EBP: Evidence-based practice; PT: physical therapist; OT: occupational therapist; ST: speech therapist.

Table 4. Continued

Possible solutions of promoting EBP in the rehabilitation profession in Japan	Percent agreement (agree or strongly agree ratings)	Average	Median	Coefficient of variation
Offering incentives at early stages	43.5	3.4	3.0	21.8
Creating public awareness that implementing EBP is essential by widely highlighting EBP usefulness in mass media such as TV, newspapers, and magazines	34.4	3.3	3.0	22.5
Running awareness campaigns to improve collaboration among medical staff and with patients to increase patient confidence	31.3	3.3	3.0	19.0
Creating a qualification to teach the EBP implementation	27.5	3.3	3.0	18.1
A formal decision from the upper management to authorize and include EBP in PT/OT/ST	23.7	3.0	3.0	26.5
Reducing the amount of time for clinical work to afford the implementation of EBP	22.9	2.9	3.0	31.4

of patient involvement. However, these four solutions did not reach the consensus. Further, two solutions were nominated in the previous study<sup>7)</sup> and two newly proposed solutions ("creating specific workplace rules to reduce clinical workloads in order to afford EBP implementation" and "reducing the amount of time for clinical work to afford the implementation of EBP") would be associated with this barrier. However, these three solutions were not reached a threshold of consensus in this study. Clinical practice guidelines, which are beneficial tools when implementing EBP, contribute to increasing the health literacy of patients, and increasing patient involvement towards management. Patient involvement seems to be very important in EBP implementation, but Japan may not be at the stage to focus on it yet.

This study has some limitations. The first limitation is that the 10 solutions reached the predetermined criteria for consensus in this study, but it is unknown if the 10 solutions are effective. However, when finding effective solutions and planning an implementation project in the future, the findings of this study may provide useful information for considering promising solutions to be tested in clinical settings. The second possible limitation is a biased sample of PTs, although the specific number in each round was unknown. Therefore, there is a possibility that the findings may differ from those of the OT and ST populations. This study should be interpreted as findings among clinicians practicing PT/OT/ST collaboration. The third limitation is that of the Delphi method, which may raise concerns about whether the direct ideas from the participants were perfectly included in the list used in the second round. However, there is no guideline for the number of examiners and multiple examiners are better than a single examiner. In this study, to ensure that the original meaning is conceived, three examiners with different backgrounds initially analyzed the data independently and subsequently conveyed the results of the analysis to each other and discussed them thoroughly until all three examiners agreed on the list for the second round. In addition, this study discloses the original expressions and those used in the second round to allow readers to verify the validity of the expressions by themselves. Further, this Delphi study included all eligible PT/OT/STs in an association, not selected experts. As a result of targeting individuals with low levels of EBP practice, it is possible that factors attributable to the individual, such as being mindful of EBP practice and self-learning, were underestimated and that external factors were sought to resolve the issue.

#### Funding and Conflict of interest

None.

#### **ACKNOWLEDGEMENTS**

This study used data that were collected as a part of a research project conducted by the Japanese Society of Allied Health and Rehabilitation. Fee for the mail survey was covered by the Japanese Society of Allied Health and Rehabilitation. The authors acknowledge Ms. Yuri Mikamo for her assistance of content analysis.

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