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PLUS Framework: Guidance for Practice Educators

Author 1

Karina Dancza, PhD, MA(SEN), BAppSc(OT), Assistant Professor, Health and Social Sciences Cluster, Singapore Institute of Technology.

Author 2

Jodie Copley, PhD, BOccThy(Hons), Associate Professor, Division of Occupational Therapy, School of Health and Rehabilitation Sciences, The University of Queensland.

Author 3

Monica Moran, DSocSc, MPhil(OT), DipCOT, Associate Professor of Rural Health, Western Australian Centre for Rural Health – WACRH, The University of Western Australia.

Correspondence

Karina Dancza

c/o Singapore Institute of Technology, 10 Dover Drive, Singapore, 138683.

Email: karina.dancza@singaporetech.edu.sg

Telephone: +6565921486 / +6591677834

Research ethics

Ethics approval was received from The University of Queensland, reference number:

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Conflict of interest (COI)

The Authors confirm that there is no conflict of interest.

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Summary

Background: The practice educator role is complex and becoming more so with changes in placement configurations since the COVID-19 pandemic. The role requires practitioners to manage clinical activities while providing learning opportunities and supervision for students. This can be time-consuming in often stretched clinical settings. This research investigated how experienced practice educators in occupational therapy tailored their approach to supporting student learning to make the most of limited supervision time. The results were developed into the Professional Learning through Useful Support (PLUS) Framework, which revealed how experienced practice educators focused their supervisory approach with students to maximise learning.

Methods: An Action Research methodology was used across four cycles. Semi-structured interviews and naturally occurring placement documentation were gathered to determine the critical features of practice educator supervision. Template analysis was used to explore the approaches employed by practice educators to support student learning. Key focal points were linked and situated within educational theory to create the PLUS Framework.

Findings: Three key focal points for practice educators were identified: (1) guiding learning, (2) making the theory-to-practice links explicit, and (3) supportively challenging students.

Discussion: The PLUS Framework is an educational tool that describes a set of guidance strategies used by skilled practice educators, whilst acknowledging the critical influences of workplace and university contexts. The proposed key features could be useful target areas for busy practice educators to help make the most of limited supervision time. Future research will explore the PLUS Framework in different countries and professions' practice education environments.

Introduction:

Becoming a professional requires applying the thinking and decision-making processes associated with the profession to practice situations; a process often termed clinical or professional reasoning.¹

Practice education (sometimes referred to as Work Integrated Learning, Clinical Education or Placement), where students gain experience in workplace settings during their university studies, is proposed as a valuable strategy for consolidating professional reasoning and professional identity. Practice educators are the practitioners in their disciplinary field who assume a critical guiding and educating role for students when they embark on placements. Practice educators are required to supervise, coach, act as role models and assess the competency of students as they learn and apply theoretical knowledge and skills in the workplace.²

The practice educator role is complex, and this complexity has been exacerbated by changes in placement configurations since the COVID-19 pandemic. In addition to maintaining usual professional roles, a practice educator is required to offer relevant opportunities for students' skill development, observe students' performance, provide constructive feedback, and complete assessments of students' professional competencies.² Given these demands on practice educators, it is important that they use their limited time and resources with students effectively. Facilitating students' professional reasoning and identity development is a common challenge in the health professions.¹ Clear and accessible guidance which is based on sound educational principles is required to best facilitate students' learning.

Ways of teaching professional reasoning have received recent attention in the literature, highlighting potentially successful strategies such as selecting illuminating case studies, using memory aids for gathering information, and outlining techniques for the identification of critical information and managing uncertainty.³ The emotional and motivational aspects of learning have also been highlighted.¹

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The development of educators' skills in facilitating students' professional reasoning, has also been recognised in some professions such as occupational therapy with, for example, Schell⁴ publishing the Context-Based Teaching Model for Professional Reasoning. Despite the acknowledged importance of practice education for the development of students' professional reasoning and identity, guidance that helps practice educators to practically apply these educational-theory informed methods to promote learning on placement remains limited.

This investigation formed part of a larger study on how occupational therapy students learn during role-emerging placements in schools.⁵ Role-emerging placements are where the student is placed in a setting (such as a school) where there is no established occupational therapy service. They are supervised remotely by an occupational therapist who is not based in the placement location. This situation is not unlike many current practice education experiences where, due to COVID-19, students are situated remotely from their practice educator, and interactions between students and practice educators need to be intentionally orchestrated as there are fewer opportunities for incidental learning through face-to-face contact.

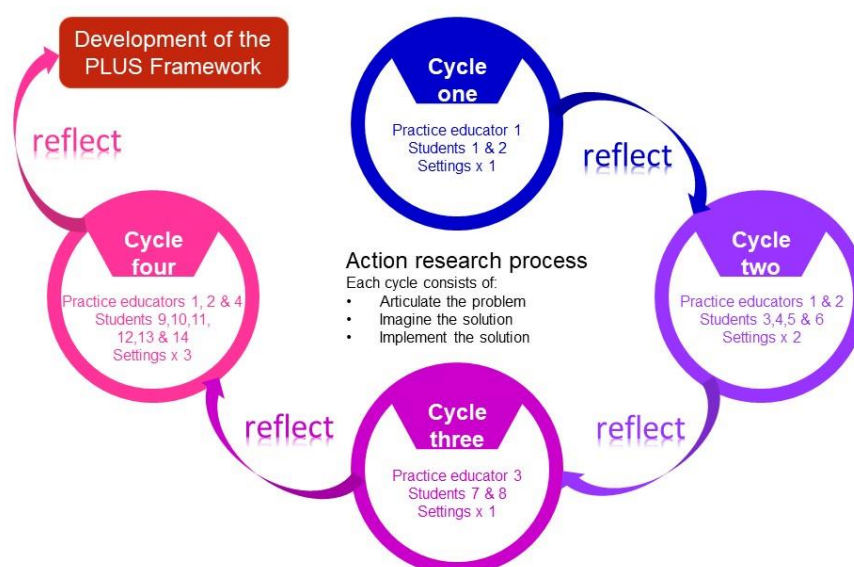
Students in this study were in their final ten-week placement of their education, so had successfully passed three prior placements. While they had some prior experience, students could approach a nominated point of contact in the workplace, such as a teacher or social worker to help manage any day-to-day challenges. Significant issues could also be raised to the off-site occupational therapy practice educator via email or phone as required. Students were guided by the practice educator and workplace contact to determine their scope of practice, through being directed to work with suitable people on defined issues and reviewing detailed plans of assessments and interventions prior to carrying out their activities. Student sessions were also monitored by relevant professionals in the workplace context.⁶

From this practice context, the Professional Learning through Useful Support (PLUS) Framework was developed to highlight guidance that would enable practice educators to capitalise on the available educational opportunities. As it was developed from practice, it offers pragmatic focal points for practice educators who wish to enhance their facilitation of students' learning within the constraints of an already busy role.

Methods:

Action Research methodology across four cycles (Figure 1) was used to investigate how expert practice educators structure their guidance of occupational therapy students' learning during practice education.⁷ Each cycle was a ten-week full time placement in mainstream or special school settings in one area of England over an 18-month period.⁶ Perspectives from both students and practice educators were gathered to understand what facilitated or challenged the learning and supervisory experiences. Knowledge of helpful learning and supervisory approaches generated from one cycle was applied and tested in subsequent cycles, adding depth and richness to the results. The results of the larger study relating to the development of a workbook supporting student's learning and the student learning processes are reported elsewhere.^{8,9} This article focuses on the supervisory experiences of students and practice educators. Ethical approval was gained from The University of Queensland (UQ/2011000720, 10 November 2011) and Canterbury Christ Church University (2011000720, 23 June 2011).

Figure 1: Action Research Methodology (adapted from Kemmis, McTaggart & Nixon⁷)



Participants and data collection

Figure 1 outlines the number of students, practice educators and settings involved in the research. Students were in their final year of a three-year undergraduate program and completed their last ten-week placement in school settings (a role-emerging placement). Students were placed in pairs at each placement site to promote peer learning, monitored onsite by a nominated member of the school staff and guided by an experienced occupational therapy practice educator based at the university for approximately half a day per week.

Table 1 shows the practice educators' prior supervisory experience and data collected. Perspectives were gathered through semi-structured interviews and naturally occurring data (i.e. supervision records and field-notes).⁷ Students were interviewed in their placement pairs one week prior to the start of placement, at the mid-point of their placement and in the week following the conclusion of their placement. These time points helped track the students' views about their learning and supervisory support received, so that successes and challenges could be noted close to when they

happened (rather than relying on a purely reflective account after placement). The practice educators were interviewed individually at the conclusion of each placement and this was the primary data analysed. However, regular discussions also took place between the practice educators and researcher throughout the placement and fieldnotes were used to capture significant events.

Table 1: Participants and data collected

Practice educator	Year of experience as a supervisor	Students	Data collected
Practice educator 1 (first author)	12 years	Students 1 & 2 Students 3 & 4 Students 9 & 10	<ul style="list-style-type: none"> 4 x Post-placement practice educator semi-structured interviews, lasting 84 – 145 mins
Practice educator 2 (occupational therapy senior lecturer)	14 years	Students 5 & 6 Students 13 & 14	<ul style="list-style-type: none"> 67 x Researcher reflective fieldnotes 7 x Pre-placement student semi-structured interviews (conducted in their placement pair), lasting 25-53 mins
Practice educator 3 (occupational therapy senior lecturer)	13 years	Students 7 & 8	<ul style="list-style-type: none"> 7 x Mid-placement student semi-structured interviews (conducted in their placement pair), lasting 53-76mins 7 x Post-placement student semi-structured interviews (conducted in their placement pair), lasting 47-86mins
Practice educator 4 (occupational therapy senior lecturer)	16 years	Students 11 & 12	<ul style="list-style-type: none"> 107 x weekly student supervision records 200 x weekly student written reflections

Data analysis

All interviews were transcribed verbatim. The multiple sources of data were anonymised and thematically analysed using template analysis.¹⁰ Template analysis refers to a particular procedure for thematically analysing qualitative data, where assumptions based on the research questions, relevant literature, and experiences in first reading the data are acknowledged in the development of a coding template. The data is then interrogated based on this template of codes, categories, and themes, and where there is agreement, data is coded accordingly. Where there is disagreement, the template is iteratively refined until it accurately represents the data.¹⁰ This method acknowledged the co-constructions between the students, practice educators and researcher, consistent with the

epistemological perspective of social constructionism. Trustworthiness was enhanced through consensus coding, where two members of the research team jointly coded approximately 20% of the data on two separate occasions, before one researcher completed coding. Where discrepancies occurred, discussions took place until consensus was reached. Adaptations were then made to the template based on data and reflections from the researcher and research advisory team.

Findings:

Three themes represented the key functions of the expert practice educators' guidance of students, describing the ways in which practice educators (1) guided student learning, (2) made theory-to-practice links explicit, and (3) supportively challenged students. Table 2 provides a breakdown of the component actions of each of these three functions together with illustrative quotes from the data.

Table 2: Themes and representative data extracts highlighted key functions of the expert practice educators' guidance of students

What practice educators did:	How practice educators did it:	Representative quotes:
Guided student learning	By directing students to relevant practical skills and tools	Practice educator 2: "The students were surprised to go back and look at their university notes as something which was useful! It is that student thing about compartmentalising... In placements you have to open up the 6 boxes of the 6 modules you have done at university and rediscover information from each of them, because each of them gave you a different piece of the puzzle." Practice educator 4: "[I needed to direct students to] stuff that they were missing. So, how to build rapport with the teacher before implementing an intervention. That kind of stuff which you assume the students would be able to get on and do, but they don't seem to."
	By timing the provision of guidance to when it was most relevant	Practice educator 2: "I gradually introduced key ideas as they become valuable within that part of the learning journey and as they can become meaningful to that student."

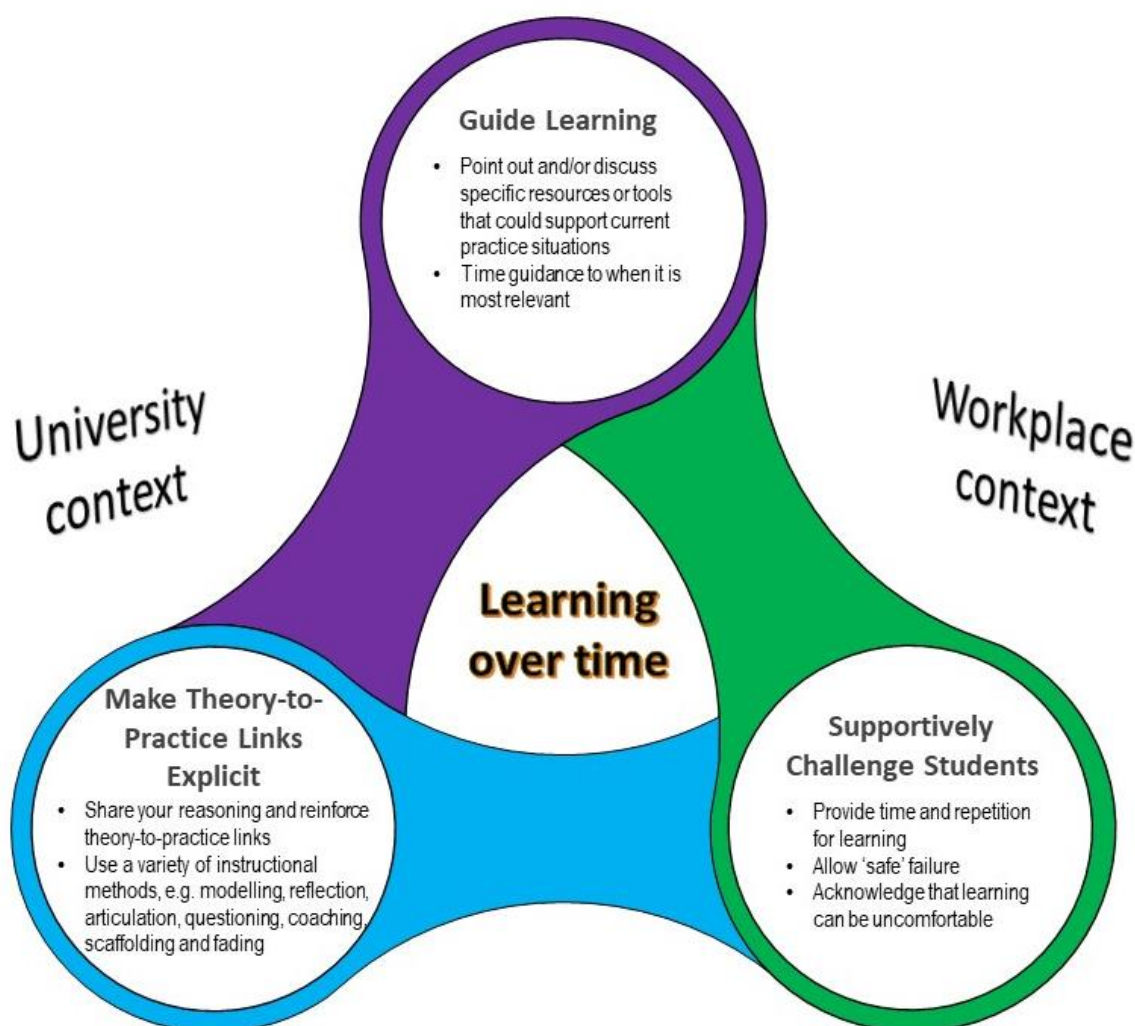
Made theory-to-practice links explicit	By sharing own reasoning and continuously reinforcing theory-to-practice links during supervision discussions	<p>Practice educator 2: "It is almost like until they see a practitioner using theory, it doesn't click for them...We need to be familiar with the theory, so everything students came to supervision with I kept coming back to theory with it... Students see theory and practice as separate rather than theory informing your practice."</p> <p>Student 3: "I value theory more on this placement as we talk about it during supervision. When you are on placement [in other settings] and the practice educator is not using theory, you end up going with the flow. As much as you want to use the theory you can't, because if they're not using it, it is quite hard to bring it in. I used to try and bring it in during supervision sessions [in previous placements], but my practice educator wasn't always interested."</p>
	By using a range of instructional methods such as questioning, modelling and reflection	<p>Practice educator 2: "The other thing within a supervisory relationship is to question; so not getting caught up in finding solutions too early."</p> <p>Practice educator 3: "One of my students worked out how she wasn't listening to the young person's story, she got lost in the process of being objective, she had lost the narrative...that light bulb ping of realisation happened as we were reflecting in supervision which was interesting because she hadn't thought of it before."</p> <p>Practice educator 4: "We should demonstrate [elements of practice]. It is lovely to go and do an assessment with the students. Maybe we need to be using video more to show them how practice is done."</p>
Supportively challenged students	By providing time for learning	<p>Practice educator 3: "I think the most important thing is time for reflection and thinking time, as long as it is used well, and it is not wasted. I could tell that it had made a difference to their learning at different points."</p> <p>Practice educator 2: "[The student] sent me an e-mail enquiring about a client and I held off responding to it immediately. In those 48 hours she had problem solved her own solution. She came back to me afterwards and thanked me for not responding immediately. She realised actually she was trying to follow someone else's idea, whereas actually what she needed to do was to trust in herself."</p>
	By allowing 'safe' failure	Practice educator 2: "Allowing the student to make mistakes is important. There was one intervention where the student was helping a young person be organised [and] he needed some equipment. I allowed her to go down her own path where she chose this equipment for him. Interestingly, he rejected that equipment [because he wanted to] choose it for himself."

	<p>Student 5: “What was quite good is when we messed up the social skills group first time around, it was a good time to have [our practice educator] come in because she is ... reflective and we needed it that week...I think we needed the reflection in that supervision and that helped make the next [social skills] group much better.”</p>
By acknowledging learning can be uncomfortable	<p>Practice educator 2: “It is the permission, the support, the encouragement, the listening that makes that space safe...But it is tiring, and it requires effort. It is an active process, it is not passive, so it depletes energy... When students are going through this learning it is probably the most painful thing that they can do. But when they have gone through it and you look back with them afterwards, they think that was nothing.”</p> <p>Practice educator 3: “[Learning] probably made the students feel quite uncomfortable at times. There is a kind of tension between helping them to feel confident and challenging them to learn about theory.”</p> <p>Student 13: “I was on an emotional roller-coaster, and you have seen me when I have thought that I’ve got it and I know what I’m doing; and then something else will happen and then I am back to not knowing what I’m doing again!”</p>

Discussion:

Through an iterative process, the authors considered how the three themes relating to practice education guidance integrated into a whole. These key focal points were then situated within educational theory to create the PLUS Framework (Figure 2; adapted from Dancza⁶). Developed from practice, the PLUS Framework is designed to provide a manageable roadmap for practice educators to support the development of students’ professional reasoning and identity.¹¹

Figure 2: The Professional Learning through Useful Support [PLUS] Framework (adapted from Dancza⁶)



The PLUS Framework is a three-wing structure that can be positioned within each student's practice learning context. These three guiding principles and their component actions allow for flexibility and creativity for practice educators to come up with a range of strategies that are individualised to the student and context, while remaining connected with learning and teaching principles. Table 3 offers some practice strategies for educators implementing the PLUS Framework. The intention of the PLUS Framework is to support practice educators to consciously take steps to embed their supervision practice within sound educational knowledge. It also outlines priority guidance areas to enhance student learning, so practice educators can focus their time and resources efficiently.

Guide Learning

Practice educators guided learning by making connections for students between university learning and how it could be applied in their current situation. These links were needed as applying learning from one context into another, or “learning transfer” is “rare and unpredictable”.^{4(p422)} Guidance was also evident as practice educators selected specific information (e.g. how to establish relationships) and shared it when relevant to what the students were doing (e.g. in the first week of placement), reflecting an intentional “gradual release” of information.^{12(p113)}

Make theory-to-practice links explicit

Practice educators explicitly revisited their own theory-to-practice links with students. These supervision discussions resonated with transformative learning theory where practice educators engaged students in ongoing two-way dialogue which encouraged co-construction and validation of new practice knowledge.⁴ Practice educators were flexible in how they reinforced theory-to-practice links with students. Elements of Cognitive Apprenticeship instructional method were used, such as modelling, reflection, articulation, questioning, coaching, scaffolding, and fading.⁴ For example, practice educators made explicit comments (articulation) about how theory was informing their own understanding of the situation and how it guided their own intervention suggestions (modelling). Supervision discussions and written reflections also promoted students’ understanding of theory informing practice.

Supportively challenge students

Practice educators recognised that students needed considerable time and repetition of concepts for deep learning to happen. This was particularly noticeable when students were required to think for themselves, rather than follow established routines.⁵ Time and space was allowed by practice educators so students could try out their ideas and learn from the consequences. Students gained confidence as they saw the results of their input and were able to learn from their ‘mistakes’ in a

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controlled and supervised environment.⁹ This supportive learning space was achieved through practice educators offering emotional support, but also challenging students to analyse, reflect and make their own decisions about their practice. This resonates with threshold concepts literature where learning is viewed as an embodied rather than a merely intellectual or cognitive process.¹³

Impact of the university and workplace contexts

The contexts in which student learning takes place are being increasingly recognised as having a significant influence on their learning process, and this was seen in the current study.¹⁴ The impact of both the placement and university settings is reflective of situated learning, where learning and knowing are inextricably located within the context where knowledge is used.¹² Practice educators provided structure to guide learning, made theory-to-practice links explicit, and encouraged students to make their own decisions and learn from the consequences of their actions, all while navigating the expectations and demands of the university, workplace, practice educators, service recipients and students themselves.

Table 3: PLUS Framework guidance for practice educators

Guide learning
Practice strategies <ul style="list-style-type: none"> Remind students of their university learning and point out specific resources or tools that they could draw from to support this practice situation. Give a few in-depth points of feedback/learning each supervision, rather than overload students with every detail. Time your provision of information to students so they can apply ideas almost immediately. Direct students to key sections of resources which are relevant to the context of the work they are doing at that time.
Make theory-to-practice links explicit
Practice strategies <ul style="list-style-type: none"> Re-familiarise yourself with the major theories or models taught to students. Share your own thinking about a clinical situation with students, identifying what models or approaches you are drawing from and how it impacts your decision-making. Be prepared to revisit conversations about theory frequently in the context of clinical experiences as repetition is needed for learning. Balance time in supervision between administrative matters, student support and discussion about theory and its relationship to practice. Consider the range and impact of the instructional methods you currently use. Aim to try one or two new ideas or enhancements each time you supervise a student.
Supportively challenge students
Practice strategies <ul style="list-style-type: none"> Strike a balance between the student's caseload productivity and thinking time. Timetable reflection and discussion time into their schedules and ensure students protect this time. Encourage students to find out answers to their questions for themselves. Do not be too quick to solve the problem for the student. Give students the space to try out their ideas and learn from what happens. Reward their willingness to 'have a go' in low stakes situations. Expect that learning will come with an emotional challenge for both practice educator and student. Talking about this as a typical experience can help. Contain the students' anxieties by allowing them to vent their frustrations and acknowledge the effort and fatigue associated with learning. Seek your own supervision and support when you are a practice educator.
Impact of the university and workplace contexts
Practice strategies <ul style="list-style-type: none"> Partner with your student's university to seek support for your practice education skill development. Embed student learning outcomes in a way that also benefits your practice setting, for example by asking students to create a resource or provide additional services to clients.

Limitations:

The findings are based on a small number of participants within one profession and in one geographical region. However, as the findings were able to be linked with educational theory and considered in relation to broader placement contexts, the PLUS Framework may have wider application. More studies in different practice areas are needed to validate the framework beyond occupational therapy.

Students were interviewed in their placement pairs as a way for them to feel comfortable to share their views with the researcher. While this was an intentional decision to help students, it may have influenced their responses in the interviews. Triangulation of data from fieldnotes and other placement documentation supplemented interview data so that elements not shared in the interviews could be captured.

Conclusions and implications for practice:

The PLUS Framework highlights critical areas for practice educators to focus their guidance of students. Rather than a list of discrete strategies, it offers a manageable way for practice educators to choose relevant supervisory techniques to guide students, whilst remaining flexible and responsive to their own and the students' contexts. It may also help define the scope of practice and role of being a practice educator. The PLUS Framework is intended to support the development of practice educators. By supporting practice educators to enhance the effectiveness and efficiency of student supervision practices, we hope to facilitate the learning and performance of future professionals.

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