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# **Original Article**

# The Role of a Liaison Team in ICU Family Communication During the COVID 19 Pandemic



Carmen Lopez-Soto, MD, Eleanor Bates, MD, Charlotte Anderson, MD, Sian Saha, MA, Laura Adams, MD, Alex Aulakh, MD, Francesca Bowtell, MD, Marie Buckel, MD, Thomas Emms, MD, Moustafa Shebl, MD, and Victoria Metaxa, PhD

Department of Critical Care (C.L.-S., E.B., C.A., S.S., L.A., F.B., M.S., V.M.), King's College Hospital NHS Foundation Trust, London, UK; Guy's and St Thomas' Hospital NHS Foundation Trust (A.A.), London, UK; The National Hospital for Neurology and Neurosurgery (M.B.), London, UK; Ashford & St Peter's Hospital NHS Trust (T.E.), Ashford, UK

## Abstract

**Context.** In the name of public safety, a general suspension on hospital visiting was imposed in the U.K., prohibiting family and friends to visit hospitalized patients, even if they were critically ill.

**Objectives.** we aimed to assess the impact of the FLT on the communication with patients' family and friends (PFF), especailly around end-of-life care, and their interaction with CC clinicians.

**Methods.** A retrospective, mixed-methods analysis of a family liaison team (FLT) formed by redeployed clinicians in critical care (CC) during the first surge of the 2020 COVID 19 pandemic.

**Results.** The FLT was constituted predominantly of non-ICU consultants (30/39, 77%). Following two one-hourly webinars around basic communication skills, the FLT facilitated over 12,000 video and telephone calls with 172 patients' family and friends (PFF). The majority of the PFF interviewed were mostly, very or extremely satisfied with the frequency, ease, understanding, honesty, completeness, and consistency of the information provided. Approximately 5% of the interviewees reported to be slightly or very dissatisfied in one or more of the following 3 categories: frequency, consistency, and ease of getting the information. The thematic analysis identified 3 themes: 1) being there with/ for the patient; 2) breakdown in communication; 3) disbelief at the speed of deterioration. In 14.9% of cases there was documented discrepancy between the information transmitted by the CC team and that by the FLT, particularly around the severity of the patient's illness and their imminent death.

Conclusion. The formation of a dedicated FLT was feasible and associated with high levels of satisfaction by the PFF. Friction was created when communication was not consistent and did not convey the severity of the patient's condition, to prepare the PFF for a bad outcome. J Pain Symptom Manage 2021;62:e112-e119. © 2021 American Academy of Hospice and Palliative Medicine. Published by Elsevier Inc. All rights reserved.

## Key Words

Family communication, Critical care, COVID pandemic, End of life

# Key Message

This article describes a retrospective cohort study of a family liaison team, tasked with the communication with patients' family and friends during the first surge of the pandemic. Although the intervention was feasible and associated with high levels of satisfaction, discrepancies were noted in the transmitted information especially around the end of life.

Address correspondence to: Victoria Metaxa, PhD, Department of Critical Care, King's College Hospital NHS Foundation Trust, London SE5 9RS, UK. E-mail: victoria.metaxa@nhs.net

## Introduction

Admission with critical illness to an Intensive Care Unit (ICU) is a significant "life-event," which has a major impact on the lives of both the patient and their family. During their ICU stay, patients often experience pain, anxiety, distress, fear, tiredness, and thirst, which they are often unable to communicate sufficiently.¹ During this difficult journey, the uncertainty and stress

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is often worse for the patients' families, who are called to fulfill multiple roles during the ICU admission: information provision, comforting influence, caregiving, and surrogate decision-making. Family and friend involvement in care has been advocated as the best model of patient management, <sup>2,3</sup> despite initial negative perceptions and organizational barriers. <sup>4</sup> Professional ICU bodies support family involvement in care, as there is evidence that it improves patient outcomes, reducing clinician burnout and moral distress. <sup>5-7</sup>

During a Public Health Emergency, standard operating procedures may cease to apply. Physical and social distancing, quarantine of a whole area or country, visiting restrictions in hospitals, and a more paternalistic approach to decision-making are some of the measures described previously, and experienced recently. During the current pandemic, the U.K. government imposed a general suspension on hospital visiting, prohibiting family, and friends to visit hospitalized patients, even if they were approaching the end of their life (EoL). As the lockdown brought to the forefront the five basic human emotional needs (to feel safe, connected, calm, useful, and hopeful), safety measures demanded distancing, intensifying the feelings of fear and separation anxiety.

In an attempt to lessen the devastating effects of patient/family separation, without compromising the need for quarantine, the U.K. medical and nursing professional bodies published guidance around different modes of maintaining communication, such as videoconferencing. We present our institution's attempt to mitigate the restrictions on physical presence by creating a bespoke team of professionals, which focused on communication with patients' family and friends (PFF), during the first surge of the coronavirus disease (COVID 19).

## Methods

A retrospective, mixed-methods analysis of a service improvement project in a tertiary London hospital was performed during the first surge of the 2020 COVID 19 pandemic (March 25 to June 1, 2020). A retrospective, mixed-methods analysis of a service improvement project in a tertiary London hospital was performed during the first surge of the COVID 19 pandemic (March 25 to June 1, 2020). During this period, a significant expansion of ICU bed capacity was undertaken (79 –150).

Baseline demographic data were collected on COVID 19 positive patients admitted in ICU for more than seven days, as well as on PFFs, the family liaison team (FLT), medical, and nursing staff. The timing, frequency, nature, and mode of communication (telephone or video calls) were recorded by reviewing

electronic patient records. Only documented telephone or video communication was included in the analysis.

The Interprofessional Collaboration Scale<sup>13</sup> was used to map the interdisciplinary collaboration and communication among the FLT, and between the FLT and the ICU staff (Appendix 1). Family satisfaction with communication was assessed with the use of the Family Satisfaction with ICU Survey (FS-ICU)<sup>14</sup> and particularly with the six questions that address the family's information needs (see Appendix 2). Friends and family were contacted to participate in a brief, onetime, semistructured, telephone interview (lasting 20 -40 minutes) to understand their experience with the technology and their feedback regarding the interaction with the FLT. If, at any point, the participants expressed emotional distress or were unwilling to continue, the interview was terminated immediately and a referral to the ICU social worker was made.

The psychological experience of PFF was collected during the interview and themes were generated using an inductive thematic analysis method, <sup>15</sup> which followed six stages: 1) familiarizing oneself with the data; 2) generating initial codes; 3) searching for themes; 4) reviewing themes; 5) refining and naming themes; 6) producing a report. The flexibility, theoretical freedom, and descriptive (as opposed to interpretative) character of this method made it preferable to alternative approaches.

The study was endorsed by the Trust's Service Evaluation Committee as a Quality Improvement Project (project ID: KCC30052020CSI) and Research Ethics Committee approval was not deemed necessary. This project did not receive specific grants from any funding agencies. The manuscript followed the SQUIRE framework. <sup>16</sup>

## Results

Family Liaison Team

A dedicated team of redeployed healthcare professionals was assembled, with a total of 39 people volunteering. The group was fully established by April 20, 2020. The vast majority (30/39, 92.3%) were medical and almost all of those (29/30, 96.7%) at a consultant grade. Approximately 25% (10/39) had an ophthalmology background, neurophysiologists, and pediatricians comprised 23% (9/39) each, 7.7% (3/39) were radiologists, whereas only 7.7% were members of the nursing team. Their main responsibilities are shown in Table 1. The teams were allocated to each ICU area, with a maximum FLT member/ patient ratio of 1:10.

The members of the FLT underwent two, onehourly, webinars around basic family communication skills, which went through explanatory material,

# ${\it Table~1} \\ {\bf Family~Liaison~Team~Responsibilities}$

Daily medical updates
Facilitation of video calls
Information provision and support for visiting<sup>a</sup>
Obtaining social history from family, if unknown
Communication of information to the medical and nursing teams
Identification of families/friends with specific needs (young children, impending bereavement, social, and psychological support) and referal to the appropriate services

"Visiting was allowed for deteriorating patients/patients approaching the end of their life.

addressing all questions. The FLT's daily schedule and teaching material are shown in Appendices 3 and 4. Video calls were facilitated throughout the day, by the use of iPads and Android devices that were donated to our Trust by the Life Lines project<sup>17</sup> and a private donation. By the end of the study period, the team had facilitated over 12,000 video and telephone calls, and communicated with more than 90% of PFFs, without any formal complaints.

#### **Patients**

One hundred and seventy-two patients who tested positive for COVID 19 were included. Their demographics and support during ICU are presented in Table 2.

At the end of the study period, 110 (63.9%) had been discharged alive from ICU and 18 (10.5%) were still in critical care, with varying levels of support. Eighty-four patients (48.8%) had left hospital in the same time frame.

## Patients' Friends and Family

Telephone interviews were conducted with 134 PFF, whereas for the remaining 38 patients: a) contact information for the next-of-kin was missing (12/172, 7%),

 ${\it Table~2} \\ {\bf Patient~Characteristics~and~ICU~Management}$ 

Age	N(%)
- 18-40	18 (10.5%)
- 41–60	90 (52.3%)
->61	64 (37.2)
Gender	
Female	53 (30.8%)
Ethnicity	
- Black	78 (45.3%)
- Asian	18 (10.5%)
- White	54 (31.4%)
- Mixed or other	22 (12.8%)
Organ support in ICU	
- Respiratory	79 (45.9%)
- intubated	37 (46.8%)
- Respiratory and cardiovascular	81 (47.1%)
- Respiratory cardiovascular and renal	11 (6.4%)
ICU LoS (days)	
- 7–14	42 (24.4%)
- 15–21	37 (21.5%)
->22	76 (44.2%)

b) the receiver of the call declined to participate (3/172, 1.7%), or the patient was, c) still in ICU (18/172, 10.5%) or d) deceased within the last two weeks (5/172, 2.9%), and hence their next-of-kin was not contacted. Of the 134 PFF, 11 (8.2%) were patients' parents, 21 (15.7%) siblings, 49 (36.6%) spouses, and 53 (39.6%) were registered as friends or having another relationship with the patient. The majority (97, 72.4%) were female. Thirty-four (25.4%) were <40 y/o, 59 (44%) between 41–60 y/o and 25 (18.7%) more than 61 y/o; 16 (11.9%) PFF declined to state their age.

When asked whether the FLT addressed their information needs, the vast majority were mostly, very or extremely satisfied in all categories (frequency, ease, understanding, honesty, completeness, and consistency). Approximately 5% of the interviewees, reported to be slightly or very dissatisfied in one or more of the following 3 categories: frequency, consistency, and ease of getting the information (Fig. 1). Neither family demographics, nor the number of actual visits, phone calls or video calls by the FLT were associated with satisfaction reported by the family. Surviving an ICU admission was associated with lower score on the FS-ICU questionnaire, but that result did not reach statistical significance (*P*= 0.08).

The responses of the participants' interviews were labeled using descriptive and *in vivo* codes. The codes describing similar contents were grouped together, reviewed, and recoded if necessary, to be collated and visualize emergence of themes. These themes were reassessed for internal consistency and validity in relation to the entire data, which resulted in some of them being subdivided, if their contents were too broad, or renamed to reflect their contents more accurately.<sup>18</sup> The study findings were organized in three themes.

## Being There With/for the Patient

There was a strong desire expressed by the majority of the PFF contacted to be in close physical proximity to their relative/ friend in ICU. The imposed visiting restrictions, although understood and accepted by all, created considerable anxiety. The wife of a patient that was intubated in ICU for weeks became emotional when describing her experience:

"... it was a difficult time for our family... not visiting was horrendous"

The ability to see their relatives and friends with the help of a video call gave an opportunity to reconnect and feel as part of the patient's care, as they would have before the implementation of the visiting restrictions. A relative that used frequent video calls to communicate with her father described it as:

<sup>&</sup>quot;a lifeline. . . a brilliant service. . ."

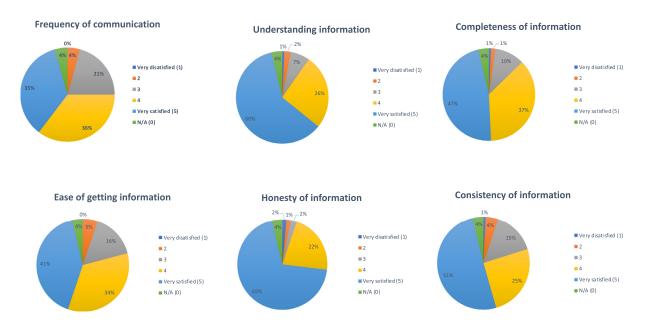


Fig. 1. Family and friend satisfaction with the FLT. FLT, family liaison team.

There were participants that expressed feelings of guilt, as they felt torn between their need to be close to the patient and their fear of contacting the virus and transmitting it to their own family. When asked if she would have liked to have visited her father more, a participant expressed the following:

"if times were different, I would have been there every day. I haven't visited him, even when the staff said I could... I have my own family, you know"

## Breakdown in communication

Several aspects of unsatisfactory communication were described, namely with participants that had patients moved between critical care units. Receiving updates by different teams, using different format and at differing time points within the day, was identified as a significant stressor by the patients' relatives and friends. Staying in the same unit for a prolonged period of time created a feeling of security for the PFF that was welcomed during a time of uncertainty.

"my brother was moved between three units in the first week... they gave us no information...I couldn't locate him for a week"

"I hardly spoken to a doctor for two weeks...very inconsistent...when the liaison team started it was better"

Receiving relevant and clear information regarding the patient's condition and the care they received was a way that PFF felt connected to their loved ones. Their inability to be physically present deprived them of the chance to be involved in the patient's journey through ICU and interact directly with the caregivers. When the updates they received did not contain the information they required, they experienced feelings of frustration and disbelief. The wife of a patient that died in ICU stated the following:

"...lots of explanations were given about going on and coming off machines but no one explained the implications of this..."

"I feel that the 'specialist' team was not appropriate to communicate with the families... I appreciate their honesty but the information was inconsistent and they couldn't answer any of my questions"

## Disbelief at the speed of deterioration

Some participants' last impressions were that of the patient leaving their home only slightly breathless. Since they were not able to personally witness the care the patients received or their deterioration, when they were informed that their loved ones were approaching the EoL, they expressed feelings of anger, disbelief, a sense of unreality and confusion. One of the participants voiced not only incredulity but also suspicion of foul play:

"the nurses were so helpful, the doctors lacked empathy... while she was there (in ICU), there was a coverup; there was a lot they didn't tell us..."

Making sense of the death of a loved during a short illness, involves taking the time to reconcile with the unexpected event and its unwelcome outcome. When only a short time is available between breaking bad news and death, then not being able to be close to the patient can cause feelings of anxiety and leave unanswered questions. As communication between PFF and the clinical team was impaired during the pandemic,

transfer of information was disrupted, increasing frustration and anger.

"they kept telling us he was stable... then they called us to tell us he was dead (...) how is this possible?"

## ICU clinicians - FLT

Questionnaires were sent electronically to 33 ICU physicians and 115 nursing staff. Of those 25 (16.9%) were returned fully completed and were used in the analysis. Of the clinicians that participated, 19 (76%) were female. The majority were part of the nursing team (15/25, 60%), whereas 7 (28%) were consultants and 3 (12%) physicians in a nonconsultant grade. The majority of participants (22/25, 88%) identified their inability to dedicate time to speak to family as the greatest challenge they faced around communication in the pandemic era. Lack of family visiting (20/25, 80%) and making telephone calls to break bad news around EoL (18/25, 72%) were also highlighted by healthcare professionals as areas of distress in everyday practice.

Questionnaires were also sent to the 39 members of the FLT and of those, 24 (61.5%) were returned completed in full. More than half (54.2%) were female and 87.5% were of a medical background. Twenty-five percent of the responders worked one day or less per week as part of the FLT, 66.7% dedicated two to four days to the role and 8.3% more than four days. Twenty-seven (17.9%) PFF received at least one telephone call in more than 80% of days the patient was in ICU. However, in 59.7% of the cases there was no documentation of an update call for at least half of the patient's ICU days. Similarly, 85% of PFF have not participated in a video call for more than 50% of the days the patient was in critical care.

In the majority of days (65.7%), the FLT provided an update of the patient's condition, focusing on the trend in organ support. The rest of the calls predominantly involved communicating a deterioration or transition to EoL care (14.2%) and informing the PFF of the patient's discharge from ICU (20.1%). In 14.9% of the patients' notes (20/134), there was documented discrepancy between the information transmitted by the critical care team and that by the FLT. In particular, critical care staff expressed concerns around the ability of the FLT to convey the severity of the patient's illness and prepare the family for a bad outcome, instead of simply imparting organ support parameters, that did not fully portray their deteriorating trajectory.

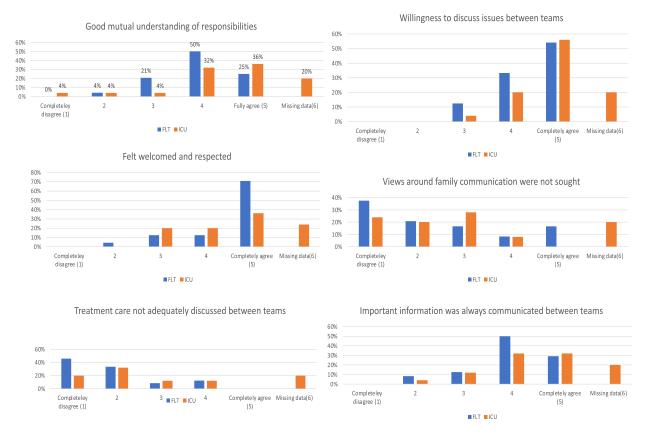


Fig. 2. Interprofessional collaboration between ICU staff and FLT. FLT, family liaison team; ICU, Intensive Care Unit. The Interprofessional Collaboration Scale question "Was one team usually willing to take into account the convenience of the other?" is not demonstrated.

The Interprofessional Collaboration Scale results are presented in Fig. 2, as a comparison between the ICU and FLT teams.

## Discussion

The psychological impact of COVID 19-related separation on ICU patients, families, and staff is only just beginning to be recognized. This study presents our experience in creating a dedicated team, tasked with the daily communication and update of the family and friends of ICU patients. Even though satisfaction with information provision was rated as very high by patients' relatives and friends, important difficulties in communicating news from the medical staff to the FLT team and from the FLT to the PFF, especially around EoL, were identified.

The literature indicates that family and friends feel the need to be near the patient during a critical illness not only in an emotional but also in a physical sense.<sup>19</sup> They identify their presence as an important element toward patients' recovery, by directly demonstrating and communicating love and support.<sup>20</sup> Moreover, family members' understanding of the patient's unique characteristics and personality is crucial to the patient's experience of being understood, recognized, and acknowledged.<sup>21</sup> The enforced separation of patients from the ones that care for them due to the COVID 19 pandemic was highlighted in this study as one of the most significant challenges the PFF had to face. This is in line with observations made elsewhere <sup>22,23</sup> and highlights that restrictions in family visits increase uncertainty around the comfort and care the patients receive, especially during EoL.<sup>22</sup>

Interestingly, the absence of family members during the patients' ICU stay and the distress of breaking bad news over the phone were the two most important stressors identified by the clinical staff in our institution. It has been previously demonstrated that supporting relatives during the EoL process is perceived as an integral component of the nursing role, alongside caring for the physical needs of the patient. Their inability to provide family-centered care, including relinquishing their role as an important information and comfort provider, especially around the patients' last moments, led to a feeling of discomfort and distress, in accordance with other published literature. The patients is a second of the patients are the patients of the patients are th

An attempt to replace physical visiting with virtual presence, using electronic equipment and software, was quickly made in various healthcare systems and recommended as best practice.<sup>28</sup> The majority of the publications have mainly focused on the technological aspect of implementing the software and its potential disadvantages.<sup>29,30</sup> Our work highlights the intricacies of using redeployed, non-ICU staff for the communication of sensitive, specialized information to PFF. The

complexity of the interaction between ICU clinicians and families lies in the fact that the communication goes beyond a simple relay of information. Critical care clinicians aim to optimize the ability of surrogates to hear, understand, and use the information provided to facilitate decision-making. 31,32 Interpersonal and communication skills are necessary and are usually acquired in ICU through supervised practice with feedback. The identified discrepancies between the clinical picture that the medical team wanted to convey and the one painted by the FLT may be due to the non-ICU background of the redeployed staff and the different training they had undergone. 33,34 Comments made by family members ("the nurses were so helpful, the doctors lacked empathy") also highlight the importance of incorporating communication skills in core medical training, particularly in ICU.<sup>34,35</sup>

Along the same lines was the evaluation of the service by the providers themselves, the FLT. Despite reporting a sense of purpose and pride in being able to contribute during a time of global need, the members of the team also described feelings of anxiety and moral distress, with approximately 10% of them reporting important information was not always communicated to them by the ICU team. Several explanations can be offered, the most pertinent being the lack of integration of the FLT within the ICU practices. Successful teamwork in ICU is often hampered by a lack of adequate communication, collaboration, and decision-making among team members, leading to discord, disagreement, and ultimately conflict.<sup>36</sup> In our study, the FLT interacted with physicians only during the twice daily exchange of information and with the nursing staff during the facilitation of the video calls. No member of the FLT was known to the ICU staff before the redeployment and their participation in decision-making was minimal, even though they had the most interaction with the family members. It is unsurprising that both the "external team" and the PFF acknowledged the inefficient collaboration, despite their overall satisfaction with the service. The result denotes the inability to integrate the newly formed team, due to the seriousness and urgency of the health emergency.<sup>37</sup>

End-of-life is a particularly traumatic time for families, especially when they are asked to participate in decisions around limitation of life-sustaining treatment, a role that is not welcomed by all surrogate decision-makers.<sup>31</sup> In this study, the commonest concerns expressed by the PFF pertained to the communication around EoL, highlighting the importance of a robust communication strategy in supporting family members in this area. Family presence at time of death and open or more flexible visiting hours were factors that addressed the family needs of critically ill patients.<sup>38,39</sup> It is possible that the relative relaxation of the restrictions around a patient's EoL was translated into the increased satisfaction score that was observed in the PFF.

The separation of patients from the ones closest to them revealed another issue around decision-making, which became much more complicated. Before the pandemic, PFF were granted unlimited visiting rights and were present to witness the clinical deterioration of the patient, as well as the efforts of the staff to support them, which wasn't possible during the pandemic. This probably explains the frequently documented disbelief of the family ("they kept telling us he was stable... then they called us to tell us he was dead (...) how is this possible?") and the lower reported scores in the "completeness" and "consistency" of information sections of the FS-ICU questionnaire.

This study has several limitations. First and foremost, it is a retrospective evaluation of a service evaluation project, which used self-reported questionnaires for the assessment of both family satisfaction and interprofessional collaboration. Despite their widespread use, patient reported outcomes are prone to recall bias, 40 which may have affected the reliability of the results. Nonetheless, the unexpected and rapidly evolving nature of the pandemic made the undertaking of any other study design logistically very challenging. Second, participation of clinical staff was very low compared to that of the FLT team (17% vs. 62% of fully completed questionnaires), raising concerns around the representativeness of the sample. The difference between the two is most probably attributed to the fatigue experienced by frontline staff, as well as their need to distance themselves and restore.<sup>41</sup> However, personal experience from all authors confirm the reported results, especially regarding the difficulties encountered with the absence of family and friends from the patient's bedside. Last, we took a liberal approach to coding and generating themes from the family interviews, using an inductive approach within a thematic approach. The interviews were not audio recorded and transcribed but detailed note-making and annotations of the family conversations were made and analyzed. Although this process may possibly lead to information loss, it is a recognized method of "recording" interview data and it allowed our clinicians to approach the families in a timely fashion and simultaneously record their memories and ideas, which were then used in the analysis.<sup>42</sup>

## **Conclusions**

The formation of a FLT, tasked with the daily update of and communication with friends and relatives of ICU patients during the COVID 19 pandemic, was feasible and very well accepted by all stakeholders. The overall feeling from PFF was that of gratitude, as the team provided a link with the patient when visiting was restricted. Nonetheless, several cases of miscommunication, especially around EoL care, were reported both by relatives and ICU clinicians. Additionally, members of the FLT expressed feelings of distress, when the calls pertained

the communication of "bad news." The results highlight the difficulties encountered during family communication in the COVID 19 era, which were exacerbated by the urgent introduction of a brand new, non-ICU team.

## **Disclosures**

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# Supplementary materials

Supplementary material associated with this article can be found in the online version at doi:10.1016/j.jpainsymman.2021.04.008.

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