

Visions of Future News – Consensus or Conflict?

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Abstract. The move from print to multimedia will cause changes not only to the form of the news service but also the involved processes in the news organizations. The cooperative scenario building technique is used on a number of groups; end-users, management and media professionals to envisioning the news services of the future. We take the perspective of consensus and conflict to illustrate the identified visions. Firstly, we illuminate conflicts and consensus between the groups, regarding their visions and future use scenarios. Secondly, we show the implications of using the cooperative scenariobuilding technique in relation the consensus and conflict perspectives in cooperative design. We conclude that both consensus and conflicts could be found in the scenarios described in the paper and that the cooperative technique was suitable in this context.

1 Introduction

The current incarnation of on-line newspapers on the Internet is only the beginning of a move from the print metaphor of news to something else, which is more appropriate both for the new medium and for its new contexts of use (Eriksen & Ihlström, 2000). This move will cause changes to the work of producing the new product, and to the lives of the audience members. To envision these changes, we conducted a series of nine workshops in the context of the user requirements phase of the Electronic Newspaper Initiative project (ELIN-IST-2000-30188). The workshops had the ELIN vision of wireless and broadband access, a diversity of media terminals, such as smartphones and media home platforms, and the possibilities of interactive video, 3D and personalization, as a starting point. During the workshops, the participants first articulated problems and concerns about the technology vision, then

the problems were turned into a vision of a desirable future, and finally scenarios of future technology use were created. In this paper we examine the consensus and conflicts of interest between the different participant groups that emerged during the workshops. The participants represented either end-users, or management, or media professionals, all with different motives for their participation and expectations of the future news service.

Regarding the issue of harmony (consensus) and conflict, (Bødker, Grønback & Kyng, 1993) and (Iivari & Lyytinen, 1999) disagree. On the one hand Bødker et al. (1993) states that “*The design process, as any process, is a political one and leads to conflict.*”. They furthermore emphasise that “*... organizations are characterized by conflicts, most significantly between management and labor, and because different groups have different power and resources in the organization.*”. On the other hand, Iivari and Lyytinen (1999) states that despite having sympathy for resource weak groups, cooperative design is characterized by “*a harmonious dialogue*” between the designer and the user.

We take a consensus perspective within each workshop and a conflict perspective between the workshops. We believe that consensus is found within each workshop, but that workshops with different groups may present conflicting problems and scenarios. Thus, the objective of this paper is twofold. *Firstly*, as a study of future news visions, it will illuminate some of the conflicts and similarities between user groups that emerged during the workshops, as problems, visions, and future use scenarios. *Secondly*, it will show the implications of using the cooperative scenariobuilding technique.

The next section describes the method used in the study, followed by section three that presents the visions of future news. In section four consensus or conflict are discussed and section five concludes the paper.

2 Cooperative Scenario Building

The co-operative scenario building technique was developed to support scenario building in the context of a future workshop. In its basic form, a future workshop has three main phases; critique, fantasy and implementation (Jungk & Müllert, 1996; Bødker et al., 1993; Kyng, 1988; Pilemalm, Hallberg & Timpka, 1998; Tollmar, Ovidiu & Schömer, 1996). However, in this method only the critique and fantasy phase (vision and cooperative scenario building) remains, whereas the trigger phase has been added. To the fantasy phase, cooperative scenario building has been added, to create design artifacts embodying future use scenarios (figure 1).

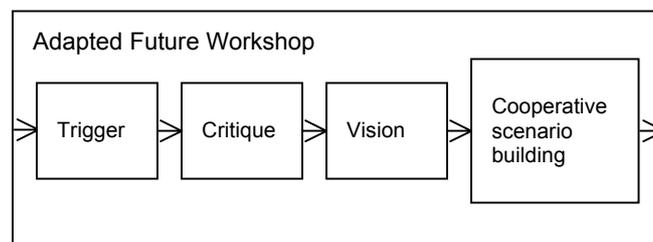


Figure 1. The Future Workshop model used in this study

Thus, with this technique, future workshops go beyond “lively discussions”, a limitation of the technique stated by (Kyng, 1988). The implementation phase is left to the design team to deal with, which is consistent with the use of the future workshop method in Bødker et al. (1993) and Pilemalm et al. (1998). With these changes, a workshop can take as little as two and a half-hour to conduct, up to half a day. It differs from other techniques using a future workshop where the workshop has a focus on current practice rather than future practice scenarios (Bødker et al., 1993). Regarding future workshops using the metaphorical design technique (Kensing & Madsen, 1991) our method has less of a focus on the ways of talking about a computer system, but rather a focus on ways of using a set of new technologies to reach a common goal. The co-operative scenario building technique is similar to other scenario building techniques such as PICTIVE and CARD in that it produces a design artefact consisting of a scenario made by the participants using cards placed on a flat surface. It differs most markedly from PICTIVE, which focuses on the interface level of interaction. Further, it differs from CARD, in that CARD has a focus on the workflow of using a particular artifact, whereas this technique has a focus on events, where different artifacts may be included in different activities (Muller, 1991; Muller, Tudor, Wildman, White, Root, Dayton, Carr, Diekmann, & Dykstra-Eriksson, 1995).

In a co-operative scenario building future workshop, the facilitators/workshop leaders have different roles in each phase. In addition, the facilitators sequence the workshop, deciding when to switch from one phase to another. There has to be at least one facilitator for the workshop to function. The different phases of the method are Introduction, Trigger, Critique, Vision and Scenariobuilding.

Introduction phase - This phase starts with a short presentation of the current project. The goal of the project is described, who the involved partners are and what the role of the workshop leaders is. Then the role of the participants in the workshop is explained, why they are there and what is expected from them. The different phases are explained briefly and it's stressed that we need their active participation during this process. This phase generally lasted about 15 minutes.

Trigger phase - The purpose of this phase is to increase the participants' awareness of what is possible to achieve with a technology. This is achieved with different triggers that show the possibilities of the technology. The shape of this phase naturally depends on the purpose of the workshop, e.g. services, artefacts, or roles.

Critique phase - The critique phase focus on problems related to the situation triggered in the former phase. The participants are asked to brainstorm about problems and limitations they see related to this. All problems are written on large sheets of paper that everybody can see. Every problem is written down. The facilitator stop this phase when the time limit is reached, the same problems is repeated, or no more problems arise. Then the participants rank the most serious problems.

Vision phase - The purpose is to turn the problems into a positive image, in order to get the participants the space to come up with creative scenarios without being constrained to the problems of today. The facilitator starts with the highest ranked problem, giving the participants the possibility to discuss how a problem should be turned into a positive image. This phase involves active participation from the workshop leaders. Post-it notes are used for the positive image statements. They are also put on the large sheet of paper used in the phase above. The positive images from this phase are later used as prerequisites for the scenarios that are the outcome of the workshop.

Scenariobuilding phase - The scenarios are created with a futuristic picture in mind, where vision achieved in the previous phase, and the technologies presented in the trigger phase coexist. The

facilitator and the participants initiate the scenario building by picking a central event or process. This can be accomplished by relating to a real or imagined event or process. A label with "What?" is filled with a short description of the central event or process. Then the facilitator ask questions related to "When?", "Who?", "Where?", "How?" and "Tools?". The participant's own words are used in the scenarios in order to get their active participation. Therefore the participants have to write their suggestions themselves on small notes only pre-labeled with the questions above. This can be made possible by placing the large white paper in the middle of the table with the participants' placed around it. Here, one facilitator is responsible for placing the cards on the board, checking that the scenarios are complete. A facilitator hands out the proper cards to participants expressing ideas. It is also possible for the facilitators to come up with suggestions to the participants, when the scenariobuilding activity slows down. However, it is important that the participants propose the use of the technology etc., placing it into the scenario. It is sometimes necessary to intervene, but it should be done with caution, to minimize manipulation. When several scenarios are completed it may be useful to have the participants rank them according to their own preferences, to guide later design decisions about what scenarios to implement.

3 Visions of Future News

Nine workshops were conducted, in the context of the ELIN project (see table 1), although the first workshop did not include the scenario-building phase.

WS	Focus	Participants	No
1	Community / end users	Sport Community	5
2	Tools	Journalists, editors etc.	6
3	Tools	Journalists, editors etc.	6
4	Business models	Marketing & managing	7
5	Community / end users	Political community	3
6	Community / end users	The elderly	5
7	End users	Early adopters	10
8	Business models	Marketing & managing	10
9	Business models	Marketing & managing	10

Table 1. The conducted workshops

Workshops 1-7 were conducted in Sweden whereas workshops 8-9 were conducted in Spain. From each workshop, we achieved a problem list, a vision list, and scenarios. Below, we present some items from the visions list of the workshops, these are not presented exactly as they were stated during the workshops, but have been reformulated to present the meaning of the statements more clearly, and they also have been translated from Swedish or Spanish.

The scenarios are based on the structure of events from the workshops, the; *what*, *when*, *who*, *where*, *how*, and *tool* of the events. This structure of events has been filled out with details to create a

lively scenario. This is necessary since scenarios are more effective when presented as vivid descriptions of events. Therefore, the details of the scenarios are arbitrary. We will illustrate how the scenario cards were turned into vivid scenarios, with the “In the kitchen” scenario from workshop seven (table 1).

The “In the kitchen” scenario, is part of the main scenario “Airbags are death traps for children”, which was one of the main headlines of the Östgöta Correspondenten newspaper, on the day of the workshop. The scenario cards involved in the “In the kitchen” scenario are presented in table 2, together with some cards from the main scenario. The first card sets the main scenario. Cards two and three describes what to do when one has received the news and realized it refers to ones own car, and are a part of the “In the kitchen scenario”. The fourth card is the sub-scenario, setting the context for the next two scenarios. Cards 5-7 are used to create the “in the car scenario” (not presented here) and cards 8-11 are the skeleton of the “In the kitchen scenario”, which is described under “early adopters” in section 3.1.

When writing the scenario, we used the cards as the skeleton, but replaced “the grandchildren’s” car with “ones own” car, for coherence, and included cards 2 and 3 since the “WHERE” and “WHEN” of this sub-scenario was not specified, but fits to the “In the kitchen” scenario.

1	WHAT	Airbags are death traps for children
2	WHAT	Want to know who can disconnect the airbag
3	HOW	Map and address to service place
4	WHAT	Find out whether there is a problem with the grandchildren’s car
5	WHERE	In the car, everywhere
6	WHEN	If I am in the car, at once. Otherwise when I check my news.
7	HOW	In the car, sound. Otherwise, text.
8	WHAT	In-depth information, information from the organization that found the problem.
9	WHERE	At home, relaxed.
10	HOW	All news as text (paper or screen) or speech.
11	HOW	A movie of the inflating airbag.

Table 2. “In the kitchen” scenario

We here present selected visions and scenarios from the workshops. We have categorized the workshop participants as audience, media professionals and management. We have used McQuail’s (2000) media organization in a field of social forces to categorize the different groups involved in our study. These form the basis of our subsequent discussion, however not all scenarios referred to in the discussion can be presented here, due to space constraints. All scenarios are presented in the ELIN report (forthcoming).

3.1 Audience interest/demand

Early adopters

This scenario and visions is based on workshop seven (table 1), with ten participants. They are characterized as early adopters of technology, which means that they are among the first to adopt new technologies.

Visions:

- Easy to read on the screen
- News available on demand anywhere and whenever one wants them
- Services are easy to find
- High trustworthiness of news
- In depth information on demand.
- Flow in the reading process, distraction is avoided.
- Easy to avoid already seen news
- More local news

Scenario: In the kitchen

Background: The local newspaper has just presented a news item about how airbags are death traps for children.

“David is in the kitchen preparing dinner, when he receives a phone call from his wife Berit about a possible problem with the airbag in their car. He immediately switches on the internet radio, and asks for the news item. He has it read to him, while preparing the food. When he is done with the food, he is still concerned, and switches on the news service on the TV. He asks for in depth information about this news item, and receives the speech made by the organization that discovered the problem. He figures out that their car should be sent to service to disconnect the airbag. He then asks for the nearest service place, and receives a map with the service place marked on it.”

Featured technology: Audio/Video, mediating services

The elderly

This scenario and visions is based on workshop six (table 1), with five participants. They are characterized as elderly, not only because of their age, but also because they are retired. This means a lot for how they structure the activities of their days.

Visions:

- In depth information on demand.
- Interact and ask questions during the newscast.
- Watch news at any time.
- Being able to control the pace of the newscast, and skip old news.
- Increased diversity.
- More of news from the neighborhood, more about the elderly, more from Europe

Scenario: Icy Streets

Background: A heavy snowfall and cold weather has made the streets icy and slippery at places. Some streets are not easy to pass, since the snow is yet to be removed. As a further complication, icicles hang from some roofs, and incidentally fall down on the pedestrians below. Several people in other cities have been in accidents already. This is a particular problem for the elderly, who might be less agile than the younger population.

“Isadora is walking on the sidewalk of the main street, when suddenly her smartphone beeps. She stops, looks at it, and notices the ice warning on the display. She looks at the sidewalk, and concludes that the warning is to be taken seriously, and she crosses the street to a safer sidewalk. From there she notices the heavy icicles hanging from a house ahead, and sends a warning about it to the local newspaper.”

Featured technology: Personalization (context-dependent service), end-user contribution.

The community

This scenario and visions is based on workshop five (table 1), with three participants. They are characterized as members of a political community, and their visions and scenario are presented as members of the community.

Visions:

- Reaching a large group
- People should feel involved
- Politically important questions are made visible
- People are given space to speak
- Increased diversity

Scenario: After the demonstration

Background: A political organization has decided to demonstrate against the bombings against Afghanistan, in the center of Linköping, Sweden. The demonstration will feature a speech at the main square. It is very common that various organizations organize small demonstrations with speeches in the city. Since most demonstrations take place during weekends, the local newspaper does not cover them all.

“Liv is again at her house, with the three people covering the demonstrations with their digital cameras. She also has the audio recording of the speeches and the texts of the speeches. Together, they select a few good pictures, and checks that the audio recording was all right.

Liv then logs onto the Community Portal again, and writes a short text on the issue. She then uploads the pictures, audio and texts for the speeches. She accepts the proposed automatic layout of the page, and then looks for the news at the local paper. As she only finds a short notice about the demonstration, she pushes the link-me button, to propose her community portal news item to be added as a link from the short notice. This proposal is forwarded to the newsdesk at the local paper.

She then returns to the Community Portal, and marks the article as a readers forum item, allowing people to comment and discuss it at the community page of her political group.”

Featured technology: Audio/Video, personalization, end-user contribution

3.2 Media professionals

These scenarios are based mainly on workshop three, whereas the visions are based on workshops two and three (table 1), with a total of 12 participants. The media professionals are all immersed in the news production of today.

Visions:

- access to external databases
- support for a wide range of media-formats
- the company profile don't get lost in the personalization
- the customer know where to go when questions arise regarding advertising and articles
- the customer understand the relation between news-content and commercial content.
- the level of interaction is bearable for the customer
- the same content shall be possible to consume through vision and sound, e.g. possible to convert text to speech and speech to text.
- moral awareness among employees
- not to dependent on large advertisers
- time and resources to create video at broadcast quality
- resources to create low quality video from the field
- all material should be reviewed before publishing

Main scenario: Airplane crash

Background: One afternoon during the annual "Water Festival" in Stockholm, a plane performing an air show crashes. In the city where the plane was developed, the local media organization sees the need for a massive coverage of the accident.

Scenario: News gathering

"Immediately after that the news desk got the alert, the web reporter put some textual information on the web site. At the same time he marks the telegram as a news item that should be sent out to the subscribers of the "flash-service". In the radio studio the producer starts to prepare an extra newsbreak based on information from the news desk and the web reporter. The first team of reporters is sent to Stockholm, equipped with portable video- and audio-recorders and necessary writing devices. The editorial staff at home drops what ever they are doing and start to cover the local aspects of the accident. They also starts to collect material for the in-dept articles that will appear in the Internet edition and the morning paper the next day."

Featured technology: Personalization, Audio/Video

Scenario: At the animator / illustrator's desk

"Later that night in the newsroom, the animator takes the initiative to illustrate the scenario of the plane crash in Stockholm. The information available includes a number of video clips of the crash from different views that reveals important information about the plane and its behavior before the crash. There is also some technical information available about the plane (model, serialnr. etc.) and some geographical information regarding the location of the crash. The research team has also put together a timeline of important events that could be useful."

Into the 3D-modelling environment the animator import a map of the immediate location of the crash and a map of the city of Stockholm. She also imports a simple 3D-model of the plane type from one of the available archives. In the 3D-modelling environment she recreates the scenario of the crash and makes facts about the plane and the location available in textual form.

The result from her work is an interactive sequence that enables the end user to play, pause, play in reverse, change view and get facts about involved objects and scenes.”

Featured technology: Audio/Video, 3D

3.3 Management

These scenarios and visions are based on workshops four, eight and nine (table 1), with a total of 27 participants from Sweden and Spain. They are all in management positions.

Visions:

- There is no need for Internet to be free of charge
- The media companies gets a large share of the income
- Resources and competencies for business development exist
- Organizational culture for multi channel publishing exist
- Enough traffic on electronic media
- There are two editorial offices, one for the traditional paper, and one for Internet news.
- Good authoring tools exist for the newspaper staff, and for home users.
- Copyright problems for parallel publishing are solved.
- The media company staff has the knowledge and skill needed for the new medium
- Usability problems and technical problems are solved

Scenario: The news flash

“David is at a sports bar, watching a game, when a newsflash about a sportsman who has been using drugs, appears at the bottom of the screen. As he is watching on a public television set, and does not have a personal subscription to the service, he does not have access to the full story. His friend Ola, reaches for his smartphone, clicks on the news-icon, and reads the short version of the story. Ola then tells him what the story is, feeling good about being the first to know.

A friend of theirs, Sara, watching the game at home, subscribes to the service, and decides to read the full story in the break.”

Featured technology: Personalization, news flash.

Scenario: The weekly groceries

“Anne is at work at a Tuesday morning when she gets a personalized e-mail on her multimedia computer with tips for meals for the week along with recipes. These tips take into account that her daughter is allergic to certain food. The mail also consists of a link to a video production of how to cook some of the meals and tips of where to find some of the ingredients for a special price. She takes a quick glance at the food show at once, finds it interesting and then decides to look at it later that evening when her husband has put the children to bed. After watching the food show later that night on the TV/computer she orders all the groceries that she will be needing during the week with her remote control and is using the some of the offers for special price.”

4 Consensus or Conflict?

When discussing consensus and conflict in this context we define consensus as shared visions and scenarios, which support the same underlying, use values and goals. As stated in the introduction the groups in our study had different motives for their participation and different expectations of the future system.

- Audience groups; the *elderly* and the *early adopters*: private usage and desired services from a personal perspective. The *community*: reach a larger audience with their message through the news services provided by a media organization
- Media professionals: production of future news services and related publishing tools
- Management: profitability through new services

Conflicts do not necessarily need to be explicit conflicts. They could also be seen as implicit in case of differences of interest between the groups. We focus on the conflicts that have actually been mentioned during the workshops. In respect of the limited resources of the media organization the question arise what to prioritize.

4.1 Technology

Regarding the demand or interest of news presented in alternative formats besides text there were consensus within and between the different groups. *All groups* could see the value of audio, video and animations, e.g. the *media professionals* brought up the possibility to explain complicated events in more detail with the help of animations and illustrations. The *elderly* didn't bring this up, instead they focused on the possibilities to get more useful advertising with interactive 3D-environments.

There were an overwhelming consensus regarding the benefits of personalization on a content level. In the *community* they saw personalization as an effective tool to prevent the current information overload. The *elderly* saw the possibilities to filter unwanted commercials and to effectively prevent the same news to be repeated over and over again. The *management* and the *media professional* saw the possibility to reach different target groups with some sort of "newsflash" service. The *management* also included commercial messages to specific consumers.

Consensus between all groups could be found regarding technological aspects like format, devices and personalization. However, there were conflicting opinions regarding what use the technology should support. We could identify a conflict in the consensus regarding personalization, the audience groups would like to make reservations of what to receive, e.g. advertisement, while the management wants to use targeted advertisements. This reflects the view of the audience as individuals and not a coherent mass.

4.2 Produced services

At the level of targeted news in the form of a flash service the *management* focused on wealthy groups as executives while the *media professionals* saw the possibility to reach not so wealthy interest groups in the healthcare sector. The *elderly* brought up a more practical service of ice-warnings in case of risk areas in the neighborhood.

Both the *elderly* and the *early adopters* mentioned the importance of local news coverage. In case of the *elderly* the demand of positive local news was brought up, in contrast to just local accidents. *Management* considers local news as their main occupation but didn't focus on that during the workshops.

The *community*, the *elderly*, the *early adopters* and the *media professionals* brought up the aspect of the audience as a fast and important resource for news coverage. The *community* mentioned the reports of some event arranged by the community, the *early adopters* saw the possibility of communication within the local tenant-owner's association, all through some sort of portal managed by the local news organization. The *media professionals* mentioned the value of reports from their readers during exceptional weather phenomenon.

All user groups brought up the view of the audience as resource for content. This can be in conflict with the media professionals expressed concern about editorial control.

4.3 Service mediation

All groups except the *early adopters* brought up advertising in the news context. The *elderly* wanted to browse the current products on sale from the home before they went down town to the shops. *Management* put more attention to targeted offers. The *media professionals* saw the risk of mixing editorial and commercial content. The independence of the news coverage should not be questioned, but they saw the possibility of automatically connect ads to news content based on some sort of classification.

Regarding service mediation and advertisement there was a consensus between management, early adopters and the elderly. The services proposed were for instance an exclusive apartment service, a presentation of the nearest repair shop, and a service presenting a map of the current snow clearing state of the city streets, respectively.

4.4 Media aspects

All groups stressed that all content should be available all the time on demand and it should be possible to access the news content from a wide range of devices. The content pushed from the news service should however be possible to filter with some sort of personalization technique. Both the *elderly* and the *early adopters* saw the value of easy access to in-depth material.

The *management* brought up the view of in-depth and feature material as something extra, not pushed to the customer. The *media professionals* expressed their concern that in dept articles take a lot of time to put together and if it is not pushed to the customer it might not be read, viewed of or listened to.

In regard of the quality of the material in the news services the *media professionals*, the *community* and the *early adopters* agreed upon the importance of correct and checked content. The *community* also brought up that the factual matter should have the focus of attention. This corresponds to the *early*

adopters that favored this in relation to speculation. Both *management* and *media professionals* saw the importance of checking facts and correct presentation of material. The *management* saw how more responsibility was handed to the journalists, and how the free online newspapers were a threat to serious journalism.

An example of conflict is the early adopter's vision of the aggregated news service, i.e. a combination of different news sources into one personalized edition. This could be in conflict with the media professional's fear of losing the news organization's identity, if they can't control the context in which a news item is published.

The benefits of a fast news-flash service were widely identified. The same degree of consensus was found in relation to the importance of correct and checked content. The conflict between these two matters was only recognized by the media professionals.

5 Conclusions and Further Research

The natural occurrence of these points of consensus and conflict can be derived from the method used during the workshops, and to the composition of the groups. The gathering of common conflicts and visions, as well as shared scenarios in the cooperative scenariobuilding phase during the future workshops, suppress the expression of conflict. This leads to consensus within the groups when looking at the results from the workshops. Naturally there might be conflicts within a group, this however is only visible during the workshop and not in the results. Conflict may however occur between different workshop results. To allow the expression of conflict we have chosen the different groups to represent different interests.

If we instead had mixed these groups, we would either still have reached a consensus or no result at all. The advantage would have been that the groups would themselves have negotiated a common solution. However, then the conflicts would have been hidden to the designers.

Now, giving the workshop results to a designer, or directly engaging in cooperative design activities, the resulting design can be related to the conflicts of the groups. Furthermore, our results show that involving just one interest, or giving a louder voice to one interest, could result in a distorted design embodying the interest of one group, at the cost of another. This may not be for the best of the organization at large. Although this is a well-known phenomenon in systems design, this is a way of dealing with the problem. In particular, it deals with the failure of cooperative approaches to take conflicts into account as stated by Iivari and Lyytinen (1999), thereby restoring the critical edge of the trade unionist approach.

Finally, since the points of consensus and conflict have emerged from workshops with real representatives of the groups, they also illustrate very real conflicts that must be dealt with in the design of a future news service.

We have found two interesting points for future research, regarding the results achieved and the method used. Firstly, how to treat the conflicts in the development of a common product that should be balanced in respect of the conflicting interests. Secondly, we have identified a need to examine further the implications of multi-journalistic work for the news organization at large, the audience members and the news format.

6 Acknowledgement

This study is a part of the Electronic Newspaper Initiative (ELIN-IST-2000-30188), supported by the European Commission. Also sponsored by the Swedish National IT Research Institute, SITI.

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