

Organization of the clinical activity of Geriatric Oncology: Report of a SIOG (International Society of Geriatric Oncology) task force

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Abstract

Management for elderly cancer patients world wide is far from being optimal and few older patients are entering clinical trials. A SIOG Task Force was therefore activated to analyze how the clinical activity of Geriatric Oncology is organized. A structured questionnaire was circulated among the SIOG Members. Fifty eight answers were received. All respondents identified Geriatric Oncology, as an area of specialization, however the organization of the clinical activity was variable. Comprehensive Geriatric Assessment (CGA) was performed in 60% of cases. A Geriatric Oncology Program (GOP) was identified in 21 centers, 85% located in Oncology and 15% in Geriatric Departments.

In the majority of GOP scheduled case discussion conferences dedicated to elderly cancer patients took regular place, the composition of the multidisciplinary team involved in the GOP activity included Medical Oncologists, Geriatricians, Nurses, Pharmacists, Social Workers.

Fellowships in Geriatric Oncology were present in almost half of GOPs.

Over 60% of respondents were willing to recruit patients over 70 years in clinical trials, while the proportion of cases included was only 20%. Enrolment in clinical trials was perceived as more difficult by 52% and much more difficult in 12% of the respondents.

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In conclusion, a better organization of the clinical activity in Geriatric Oncology allows a better clinical practice and an optimal clinical research. The GOP which can be set up in the oncological as well as in the geriatric environment thought a multidisciplinary coordinator effort. Future plans should also concentrate on divisions, units or departments of Geriatric Oncology.

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1. Introduction

Since to organize the clinical care of older cancer patients and to address problems of aging may improve the overall treatment success and the quality of life of elderly cancer patients, a dedicated Geriatric Oncology Program (GOP) [1] should address the following goals:

1. to provide comprehensive care through a multidisciplinary approach that considers age-associated conditions which influence cancer management;
2. to conduct clinical trials in representative older patients;
3. to reduce adverse outcomes such as nursing home placement and hospitalizations;
4. to allow patients to continue to live in their primary area of life either at home, hospice, or in nursing home;
5. to educate health professionals, the public, older patients and their families about cancer therapy and research.

There is presently no widely accepted clinical model for the delivery of cancer care to frail and vulnerable elderly. Due to the progressive aging of the population, cancer in the older person has become an increasingly common problem. More than 60% of all tumors occur over 65 years and 45% after 70 years with more than 2/3 of tumor deaths in people older than 65 years. While the number of older patients has progressively risen in our wards and clinics, an elderly oriented approach is practiced by a minority of Medical Oncologist and in general the therapeutic and clinical research approach is far from being optimal [2]. Not all patients are treated, only a minority enters clinical trials and informed consent is usually not fully understandable. Furthermore the majority of patients is not managed with an interdisciplinary approach integrating the geriatric aspects into the oncological one [3]. The increasing needs of management of cancer in the elderly should require a solution taking into account a new type of organization. [4].

2. Methods

A SIOG Task Force on the Organization of the Clinical Activity of Geriatric Oncology conducted an international survey of Geriatric Oncology clinical services among its members through a structured questionnaire (Appendix A). This was circulated to 216 SIOG affiliate members from July 2005 to January 2006.

The questionnaire requested institutional data to provide a context for the description of the clinical services and to

determine the presence/absence of:

- (1) GOP or a Clinic for elderly cancer patients.
- (2) Scheduled case conference dedicated to elderly cancer patients.
- (3) Referral pathway to the GOP.
- (4) Recruitment of patients over the age of 70 years in clinical trials.
- (5) Availability of a formal training in both Geriatric and Oncology.
- (6) Geriatric assessments and time required to complete it.

3. Results

Fifty eight answers were received (26.8%) up to mid January 2006. Twelve from USA and Canada, 42 from Europe (Italy 10, France 5, Belgium 2, Germany 3, others 1 each), and 1 from India, South America, Saudi Arabia and Japan, respectively.

All respondents identified Geriatric Oncology as an area of specialization. About 20% reported having access to Geriatricians, 37% reported routine interaction between the specialists and 34% reported that Geriatric Oncology was incorporated into general oncology.

Twenty-four percent of respondents practiced in a specialty cancer hospital with the majority working in university hospitals or university affiliated teaching hospitals. Geriatric departments were not structured in cancer hospitals, while geriatric specialists were available in general hospitals.

GOPs were identified in 21 Institutes (36%), 18 (85%) were located in oncology departments and 3 (15%) in Geriatric Departments. The GOP was located more often in the oncological department of a general or university hospital (12 cases) rather than in a Cancer Institute.

Nine respondents provided GOP inpatient care unit with 7 of them located in geriatric departments and staffed by geriatricians.

The existence of the GOP was reported by 7 responders in Italy, 3 in France, 7 in USA and 1 Germany, Norway, India and Japan.

The vast majority of hospitals/centres providing a GOP had scheduled case conferences dedicated to elderly patients (81%) compared to 43% of hospitals/centres without such program. Comprehensive Geriatric Assessment (CGA) [5] was described as standardized geriatric assessment by 56% of respondents and as traditional clinical assessment by 14%. Time to complete CGA was 47 min (range 15–360 min).

Table 1
Presence of health professionals for daily team care in 21 centres

Presence in unit (number)		
Professional category	Number of units inpatient ward	Number of units outpatient clinic
Medical oncologist	19	5
Oncologist surgeon	5	14
Radiation oncologist	5	16
Geriatrician	11	8
Advanced practice nurse	15	3
Social worker	16	5
Dietician/nutritionist	10	12
Research nurse	7	8
Physiotherapist	13	9
Pharmacist	10	10
Registrars/resident physicians	15	–
Medical students	13	–

Fellowship in Geriatric Oncology was available in 47% of hospitals/centres but fellows were present in only 43% of them and CGA performed in 48% of cases.

Twenty-one of 58 respondents provided information on the composition of the multidisciplinary team involved in GOP at their institutions and details are to be found in Table 1.

Fifty percent of the respondents reported that general practitioners were unlikely to refer frail elderly patients for treatment but that selective referral to GOP because of special interest occurred in 55% of cases. However, the proportion of patients referred for specialized opinion only was 12% (0–50%).

Over 60% of the respondents reported they were willing to recruit patients over the age of 70 years into clinical trials but that the proportion of patients actually included in such trials was 20% (0–85%). Active enrolment in clinical trials was said to be more successful in cancer hospitals. Enrolment of older patients in clinical trials was perceived as more difficult by 52% and much more difficult by 12% of the respondents. Main barriers to patient inclusion were coexisting diseases, refusal of aggressive treatment, refusal of an experimental treatment and family preference.

Respondents were also requested to describe the problems encountered in clinical research for elderly cancer patients. Presence of co-morbidity, reduced tolerance to chemotherapy, heterogeneity of patients, lack of clinical study background and influence of the family were reported. In addition, financial problems, referral bias, lack of a social network and the absence of formal caregiver were also mentioned.

Some respondents emphasized on the lack of clinical trials specifically designed for older patients, on the absence of a standard definition of frailty and on the absence of prediction rules to guide treatment. Clinical research was considered a time consuming activity and the lack of funding for independent studies was underlined. Finally, the absence of a structured department of Geriatric Oncology and the lack of a geriatric network in their professional environment were

suggested as potential other causes of insufficient clinical research.

4. Discussion

The low rate of members participation to the survey is probably related to the scarcity of a structured activity in the field of Geriatric Oncology. However, useful information came from 58 members around the world. These SIOG members were all involved in the management of older cancer patients in their clinical practice. Moreover, over one third of them were actively incorporated in the framework of a GOP. These data, although biased by a very low return rate, are encouraging and show that close collaboration between specialties is achievable.

GOP was predominantly organized within Oncology Departments which appeared to be most of the time deprived of a Geriatric Department though counting on the cooperation of Geriatricians. GOP was located most of the time within an oncology department of general hospital rather than in specialized cancer centers, while inpatients cancer units were more often located in geriatric departments. During the working day, the concomitant presence of Medical oncologists and of Geriatricians was established in half of cases as was the presence of a pharmacist and a dietician. However, research nurses were present in a minority of cases in comparison to advanced practice nurses suggesting an imbalance between the need for research and that for care in this patient population.

These findings are of interest because it indicate a lack of an adequate and homogenous organization resources to deal with cancer patients in a more appropriate way. Nevertheless, the existence of some GOPs is already a step forward to a better management of elderly patients with cancer who present most of the time with multiple problems thus requiring the geriatrician expertise.

Finally, in the absence of a GOP, CGA and other forms of geriatric evaluation were obviously less frequently performed

and few scheduled case conferences were organized. This should not be considered as inappropriate management but rather as a priority target for future improvement.

Our survey also identified several different groups of health professionals dealing with geriatric and oncology illustrating the local facilities and resources together with a rough indication of health care policies regarding cancer care in the elderly.

Referral from general practitioners to GOP still appeared to follow fairly subjective thoughts and the information was somewhat contradictory. Some would probably refer patients to GOP whereas others would not. As usual, it is not possible to determine whether this was based on feelings or beliefs and the decision may depend on their own personal interest. The development and the availability of the internet are likely to make patients and families more often implicated in this process.

The majority of respondents reported to promote the enrolment of elderly patients into clinical trials but only 1 out of 4 potential candidate was actually entered. This poor result was probably caused by traditional professional biases towards cancer and the elderly and by the family reluctance to clinical studies, while it has been reported that older American and French patients with cancer, when offered chemotherapy, show a high level of acceptance [6].

Lack of proper methodology adapted to the elderly, insufficient financial support from health authorities and private sponsors, scarcity of dedicated investigators and the absence of an active Geriatric Oncology network were the main reasons explaining this situation.

5. Proposals

Expected benefits from a structured Geriatric Oncology activity are summarized [1,3]:

- to identify centers of excellence in order to enhance referrals;
- to develop and disseminate expertise on the provision of specific cancer care;
- to evaluate treatment models;
- to motivate and support clinical and translational research;
- to enhance social support and quality of life;
- to provide expert management in continuous care for follow up care.

These objectives can be achieved through a GOP in both oncological and geriatric environments if there are Medical Oncologists skilled in the management of cancer in the elderly or if Medical Oncologists are incorporated into a geriatric team. We know that after the completion of this enquiry and after the collection of further information from the ASCO Foundation and from the Institut National du Cancer, 14 such programs are active in the USA and 9 in France.

Further developments could be suggested for the near future in a positive stepwise progression, as follows:

- (1) Geriatric Oncologist with training in both medical oncology and geriatrics capable of performing CGA.
- (2) Geriatric Oncologist but CGA performed by others in close continuous relationship with a geriatrician.
- (3) Geriatric oncologist capable of doing some form of geriatric assessment in close continuous relationship with a Geriatrician or in alternative Geriatric oncologist integrated in the framework of an established relationship between the departments of Medical Oncology and of Geriatrics with scheduled case conferences.
- (4) Fully established GOP in charge of clinical, training and research programs with scheduled case discussion in connection with other specialists and general practitioners.

6. Conclusions

The situation of the organization of the clinical activity of Geriatric Oncology is highly variable in different places. There is though a common background across the various countries since the needs are present in both oncological and geriatric environment. Next to the position paper on CGA [5], this SIOG Task Force would like to encourage for a better organization of the clinical practice in managing cancer in the elderly through the availability of an efficient network allowing optimal clinical research. Every attempt should be made by Geriatric Oncologists to further develop their activity in this emerging new field [4]. GOP may already be achieved today but future plans should also concentrate on the structure of divisions, units or departments of Geriatric Oncology.

Reviewers

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Appendix A. SIOG survey: task force on the organization of Geriatric Oncology

1. Do you have a special interest or expertise in the care of elderly cancer patients?

- Yes. *Please continue with Q2 below.*
- No, but I have colleagues who do.
In this case we would appreciate it if you would pass this questionnaire on to them.
- No, this is not an area in which I and my colleagues are specialized.
Thank you and good-bye.

2. At your institution is cancer care predominantly

- inpatient
- outpatient
- Fairly evenly divided*

3. Is your principal clinical institution

- A general multi-specialty hospital
- A specialty cancer hospital
- Outpatient only

4. Is your institution a:

- University affiliated Teaching Hospital
- University Teaching Hospital
- National Health Service/Public Hospital
- Private Practice/Private Non-teaching hospital

5. For U.S respondents only: Does your institution have Comprehensive Cancer Center designation from the NCI?

- Yes
- No

6. Is there a formal geriatric medicine department or section at your institution?

- Yes
- No

7. Is there a designated outpatient clinical program for elderly cancer patients

- Yes → go to question 8
- No → go to question 9

8. Is the cancer program or clinic for the elderly administratively part of the oncology department, the geriatrics department or some other administrative arrangement?

Oncology

Geriatrics

Other. Please briefly describe the clinic oversight.

9. Is there a designated inpatient unit for older cancer patients, such as an ACE (Acute Care of the Elderly) Unit?

Yes → go to question 12a.

No → go to question 13.

10. Is the inpatient cancer unit for the elderly administratively part of the oncology department, the geriatrics department or some other administrative arrangement?

Oncology

Geriatrics

Other____Please briefly describe the administrative oversight.

11.

a. On a typical working day, which of the following practitioners are present in the clinic where you (and your colleagues) see elderly cancer patients? Please check all who are usually present (first column).

<i>QUALIFICATION</i>	PRESENT IN CLINIC	CONSULTATION	GERIATRIC QUALIFICATION
Medical oncologist MD			
Oncology surgeon MD			
Radiation Oncologist MD			
Geriatrician MD			
Advanced Practice Nurse			
Social worker			
Dietician/nutritionist			
Research Nurse			
Physiotherapist			
Pharmacist			
Registrars/Resident physicians			
Medical students			

b. If you have NOT checked one or more of the practitioners above, please go to second column (Consultation) and check those with whom you have easy access for outpatient consultations.

c. Please go to the third column above (Geriatric Qualification) and check any of the practitioners in your clinical team who have specific training and qualification in Geriatrics.

12.

a. Which of the following practitioners is present for the daily team care of hospitalized elderly cancer patients? Please check all that are usually present.

<i>QUALIFICATION</i>	PRESENT IN UNIT	CONSULTATION	GERIATRIC QUALIFICATION
Medical oncologist MD			
Oncology surgeon MD			
Radiation Oncologist MD			
Geriatrician MD			
Advanced Practice Nurse			
Social worker			
Dietician/nutritionist			
Research Nurse			
Physiotherapist			
Pharmacist			
Registrars/Resident physicians			
Medical students			

b. If you have NOT checked one or more of the practitioners above, please go to second column (Consultation) and check those with whom you have easy access for inpatient consultation.

c. Please go to the third column above (Geriatric Qualification) and check any of the practitioners in your team who have specific training and qualification in Geriatrics

13. Do you have a regularly scheduled case conference, teaching conference or tumour board in which members of the team discuss exclusively elderly patients?

Yes

Occasionally

No

14. Do you think there is a "referral bias" affecting the patients that you see? That is, do you think that in general the primary care or general physicians are unlikely to refer frail elderly patients for cancer treatment?

Yes

No

I don't know

15. Do you think there is selective referral to your clinical program because of your special interest and expertise in cancer in the elderly?

Yes

No

I don't know

16. In general, which is the proportion of your patients who are referred to you for consultation only, which means that they are expected to go to another institution for their definitive care?

%

17. Which is approximately the proportion of your patients who are enrolled in clinical trials?

%

18. Have you or your institution made a special effort to recruit patients over the age of 70 on clinical trials?

Yes

No

19. Compared to patients in general, how easy has it been to recruit older patients to clinical trials?

- Much easier
- Somewhat easier
- No more difficult than any others
- Somewhat more difficult
- Much more difficult
- Impossible
- Never tried.

20. If you have tried successfully or unsuccessfully to accrue elderly patients on clinical trials, what have been the principal barriers? Please check all that you have encountered and indicate how significant a problem it is by ranking the top 3 reasons 1, 2, and 3.

- Patients are disqualified due to co-existing diseases or poor performance status.
- Patients do not want experimental treatments.
- Family preferences for treatment.
- Patients do not want aggressive treatments.
- Patients cannot travel to receive treatment.
- Patients cannot pay for treatments nor have health insurance that will not pay for experimental treatment in clinical trials.
- We just do not see many older patients who are eligible for clinical trials.

21. Do you have a formal fellowship or consultant training in geriatrics and oncology at your institution?

- Yes. Go to Q21a.
- Yes but it is not formalized
- No

21.a. How many trainees do you currently have?

22.a. Does your institution offer Comprehensive Geriatric Assessments (CGA) in any of its clinical sites?

Yes, in our unit...go to Q. 22.b

No, we pre-screen and refer vulnerable patients to Geriatrics for CGA

No, we have no standardized screening tests. Our practice is based upon clinical judgement.

I don't know.

22.b. Does CGA always involve several types of practitioners as described above in questions 9 and 12 ?

Yes...always

Yes depending on whether they are needed

No

22.c. Does the CGA always use a set of standardized geriatric assessment instruments?

Yes, it is standardized

No, it is a clinical assessment

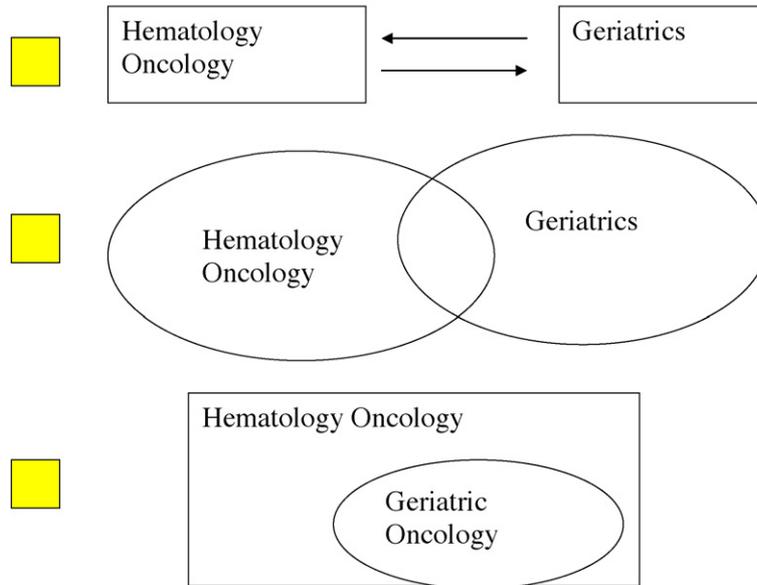
22.d. On average, how long does it take (including all staff) to complete a CGA in your experience?

hours/minutes

22. Please list the 5 most important problems for research in aging and oncology

1.	_____
2.	_____
3.	_____
4.	_____
5.	_____

24. Which of these diagrams best describes oncology and geriatrics at your institution?



Please type your name:

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Biography

Prof. Silvio Monfardini is the author of over 280 publications in indexed journals; his works concern the main fields of medical oncology with particular reference to non-Hodgkin's lymphomas, Hodgkin's lymphomas, chronic myeloid leukemia, solid tumors, phase I–II studies and tumors in the elderly. He has been President of the European Society for Medical Oncology, President of the Associazione Italiana di Oncologia Medica and of the International Society of Geriatric Oncology. At present he is Chief of the Division of Medical Oncology, Istituto Oncologico Veneto, Padova (Italy). Earlier he was scientific director of the National Cancer Institutes, Naples (Italy) and scientific director of the National Cancer Institutes, Aviano (Italy).