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## **Offer and use of complementary and alternative medicine in hospitals of the French-speaking part of Switzerland.**

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## **Summary**

**Background:** In 2004, complementary and alternative medicine (CAM) was offered by physicians in one third of Swiss hospitals. Since then, CAM health policy has considerably changed. This study aims at describing the present supply and use of CAM in hospitals of the French-speaking part of Switzerland, and qualitatively explores the characteristics of this supply.

**Methods:** Between June 2011 and March 2012, a short questionnaire was sent to the medical directors of hospitals (N=46), asking them whether a CAM was offered, where and by whom. Then, a semi-directive interview was conducted with 10 CAM therapists.

**Results:** Among 37 responses (return rate 80%), 19 medical directors indicated that their hospital offered at least one CAM and 18 reported that they did not. Acupuncture was the most frequently proposed CAM, followed by manual therapies, osteopathy and aromatherapy. The disciplines that offered CAM most frequently were rehabilitation, gynaecology-obstetrics, palliative care, psychiatry and anaesthesiology. In eight out of ten interviews, it appeared that the procedures for introducing a CAM in the hospital were not tightly supervised by the hospital but were mainly based on the goodwill of the therapists, rather than clinical/scientific evidence.

**Conclusion:** Hospitals offering CAM in the French-speaking part of Switzerland seems to have risen since 2004. The selection of CAM to be offered in a hospital should be based on the same procedure of evaluation and validation as conventional care, and if their safety and efficiency is evidence-based, they should receive the same structural resources.

**Key words:** Complementary and alternative medicine, hospital, use, epidemiology, Switzerland

## **Abbreviations:**

CAM Complementary and alternative medicine

NCCAM: National Center for Complementary and Alternative medicine (USA)

## **Introduction**

Around 50% of the Swiss population report that they prefer hospitals that offer Complementary and alternative medicine (CAM) and the majority of the population would like CAM therapies to be refunded by healthcare insurance<sup>1</sup>. This conclusion derived from a study mandated by the Swiss government in 2004 has become even more important since the voting of May 2009 on complementary medicines. It is all the more relevant as from the 1<sup>st</sup> of January 2012, the Swiss population can choose the hospital where to be treated.

Although publications in the CAM field increased from 500 in 1990 to almost 2000 in 2011 (search on medline with the key word “Complementary and Alternative Medicine”), studies on the implementation and supply of CAM in hospitals are still rare. In Switzerland, a study conducted in 2004 described for the first time the supply of CAM in Swiss hospitals: 33% of the hospitals managers indicated 1 or more medical doctor using CAM in their institution.<sup>2</sup> The most frequently used CAM was acupuncture. A direct consequence of the 2009 voting was the decision of the Swiss government to integrate five fields of CAM – traditional Chinese medicine, homeopathy, neural therapy, herbal medicine and anthroposophic medicine – in the compulsory health care insurance from 2012 and 2013 and for a test period of 6 years. The question whether this has encouraged hospitals to increase the number and diversity of offered CAM remains open.

For the present study, the definition of CAM from the National Center for Complementary and Alternative Medicine, a branch of the US National Institutes of Health in Washington abbreviated NCCAM, was used: « CAM is defined as a group of diverse medical and health care systems, practices, and products that are not generally considered part of conventional medicine. »<sup>3</sup> This definition integrates more CAM than the five CAM refunded by the Swiss healthcare insurance, such as hypnosis or art-therapy, which have been integrated for decades in some medical specialized fields.

The objectives of this study are to describe the offer and use of CAM in hospitals of the French-speaking part of Switzerland, to observe the evolution since 2004 and to qualitatively explore the characteristics of this offer within a subset of CAM practitioners.

## **Methodology**

Ethics approval was given on the 10<sup>th</sup> of June 2011 by the cantonal ethics commission of the Canton Vaud.

As no public list of the private and public hospitals of the French-speaking part of Switzerland exist, 46 hospitals were listed using the list of hospitals obtained from the Federal Office for Statistics<sup>4</sup>. This document contains a table indicating the number of hospital for each canton of Switzerland, classified either as general healthcare hospitals or specialized clinics. An exhaustive list was then created through the Internet, using the website [www.annuairemedecin.ch](http://www.annuairemedecin.ch).

This cross-sectional study was realized in two phases. In the first phase, starting in June 2011 and ending in December 2012, in order to get a global picture of the CAM offered, a questionnaire was sent to the medical directors of hospitals of the French-speaking part of Switzerland (N=46). In the second phase, starting in September 2011 and ending in March 2012, a semi-directive interview was realized with 10 CAM therapists working in the hospitals.

The questionnaire was sent by post to the medical directors of hospitals of the French-speaking part of Switzerland. In case of no-response, three telephonic reminders were completed.

This very short, one-page questionnaire began with the following question: *Does your hospital offer complementary and alternative medicine?* The term « complementary and alternative medicine » was explicitly defined on the questionnaire according to the definition of the NCCAM. When the answer was positive, the responder was asked to specify in which specialized discipline (department, division or unit) it was offered and what the professional profile was of those practicing CAM (medical therapist versus non-medical therapist). Moreover, directors were asked to provide the name and telephone number of the CAM therapists (with their consent), with the mention that they may be contacted for a semi-directive interview.

In order to be able to assess the evolution since eight years, we obtained from the Swiss Public Health Federal Office database of the Swiss study realized in 2004<sup>2</sup> (data of the

French-speaking part of Switzerland). Based on the analysis of this database, 43% of hospitals of the French-speaking part indicated that they offer at least one CAM in 2004.

Among the names of therapists given by the medical directors in the first phase, ten were chosen in order to well represent the different CAM and the different hospitals of the French-speaking part of Switzerland. For timing reason, 4 interviews were already chosen, even though the study phase I was not ended. No contacted therapist refused the interview, which was done face to face (N=6) and by phone (N=4) by the first author of the present study and lasted between 30 and 45 minutes.

The following items were notably part of the semi-directive interview: the professional education of the responding therapist and his training in CAM; the process of introducing CAM in the hospital and the reasons for such implementation; the indications and contraindications of the use of CAM; its perceived benefits and risks; the number of patients seen a month, the duration of one session and an evaluation of the mean number of sessions per patient; the type of information provided to the patients on the nature and access to CAM ; an estimate of the rate of patients accepting or denying the therapy and the perceived factors influencing their decision ; the presence of any scientific research that addresses the offered CAM in the hospital and finally how these treatments were financed.

## **Results**

The questionnaire was sent by post to 46 hospitals. The return rate was 80 per cent (37/46 hospitals). Among the 37 answers, 19 medical directors indicated that their hospital offered at least one CAM and 18 indicated not to offer any. The return rate in the private hospital was significantly lower than in the public hospitals. 25 public hospitals out of 27 returned the questionnaire while 12 private hospitals out of 19 responded to the questionnaire. CAM seemed to be more frequently present in the public hospitals than in the private hospitals. 15 public hospitals out of 25 indicated to offer at least one CAM, while in the private sector, only 4 hospitals out of 12 mentioned such an offer. Among the 19 hospitals offering CAM, most of them (N=12) indicated to provide between two and five different types of CAM. These CAMs were proposed in nine hospitals by medical and non-medical therapists, in eight hospitals only by non-medical therapists and in two hospitals only by medical therapists.

**Insert table 1-----**

Each of the 10 responding therapists reported having been trained in medicine or other health care professions (nurse, midwife or physician). Moreover, 8 out of the 10 therapists had benefited from a formal training in CAM, recognised in Switzerland, e.g. either a post-graduate complementary training of the Swiss Physician Federation or a diploma recognised by organisations such as ASCA – Swiss Foundation for Complementary and Alternative Medicine. This education was complemented by some supervision for 8 out of 10 practitioners. The nurses and midwives practicing CAM without a formal diploma followed specific directives given by formally educated therapists. This was the case for one person practicing homeopathy in division of obstetrics and another one practicing aromatherapy in a division of orthopaedics.

**Insert table 2-----**

In 50 % of concerned hospitals, CAMs were introduced between 2000 and 2008, and after 2008 for the other half. CAM introduction was based without any exception as the result of the interest of an employee. Sometimes, it was also a response to the recurrent request of patients. No therapist answered that the introduction of CAM was based on scientific data. In one case only, the introduction was accompanied by the creation of a working group by the head of the Department (gynaecology-obstetrics, introduction of osteopathy). Moreover, there was not a single hospital that seemed to foresee some research on CAM

All practitioners clearly mentioned indications. For some therapies, directives were established. In aromatherapy for example, a combination of specific essential oils to be used against nausea after an operation were specified. Moreover, in an obstetrics department, the indication of traditional Chinese medicine, e.g. acupuncture and electrical stimulation to reduce the pregnancy-related nausea and vomiting, was clearly corroborated with scientific evidence.<sup>5</sup>

Contraindications were also mentioned 8 times (out of 10). For instance, in an oncology department, acupuncture was contraindicated for patients presenting a leukopenia. Two therapists in aromatherapy and in homeopathy, both part of the gynaecology-obstetrics department, said that there were aware of no contraindication.

Concerning the benefits and risks, they were also clearly mentioned. The comfort of the patient and his relaxation were often mentioned as beneficial in therapies as reflexology, aromatherapy, manual therapies and sophrology. In a surgery department, the benefits of aromatherapy the day before an operation were the comfort of the patient in terms of reduced medication, especially hypnotics, and improved relationships with nurses. An example of risk in a rehabilitation clinic was a case of hypoglycaemia possibly linked to reflexology 24 to 48 hours after a reflexology therapy in diabetic patients.

Nevertheless, a therapist in reflexology admitted that the indications, contraindications, benefits and risks in CAM therapies still needed to be explored, adding that research in CAM should be encouraged.

Information on access to CAM was most frequently given systematically to all patients (7 times out of 10). However, if some patients were benefiting from CAM therapies, it was not mentioned in the medical patients' files. One therapist reported that it was perhaps for legal reasons. Thus, the only way for the general practitioner usually in charge of the patient to know about the occurrence of such treatments was only if the patient mentioned it.

When CAM therapy was offered, more than three quarters of the patients accepted it. The most attributed reasons for this agreement were the search for an alternative to usual medication and the expected benefit of a physical contact within manual therapies. The refusals were based mostly on the lack of trust in the therapists and in manual therapies in general, or refusal of physical contact. The factors that seemed to impact the patients' answer were the relation with the therapist and the way the CAM was presented

The number of patients who received CAM therapy varied considerably from one hospital to another: one to three reflexology patients a week in a rehabilitation division to 20 osteopathy patients a week in an obstetrics division. The number of sessions per patient ranged from one single session to three sessions according to the experience of 8 therapists (out of 10). Only one responding therapist devoted 100% of his working time to practicing CAM. Most worked on request or sometimes during fixed working periods specifically kept to practice CAM.

Finally, among 9 out of 10 therapists, the financial cost was either covered by the healthcare insurance or paid by the hospital. In one case, the patient needed to have a private complementary healthcare insurance to be refunded.

## **Discussion**

In this study, half of the hospitals within the French speaking Switzerland indicated that they offered at least one CAM. Among 19 hospitals offering CAM, most of them (N=12) indicated to propose between 2 and 5 different types of CAM and in 9 hospitals out of 19, they were provided both by physicians and other health care professionals. Furthermore, CAM seemed to be more frequently present in the public hospitals than in the private hospitals. Neither was an explanation given nor was a similar phenomenon described in previous literature. Reflexology, manual therapies and aromatherapies were preferably practised by nurses. A possible explanation may be that some nurses' school provide lectures or formal training in various CAMs. Rehabilitation, palliative care, gynaecology-obstetrics, psychiatry and anaesthesiology were the most often mentioned disciplines offering CAM. This may be due to the interdisciplinary approaches used in some of these disciplines (e.g. rehabilitation). Furthermore, there is evidence of the benefit of some CAM in these disciplines such as acupuncture e.g. in post-chemotherapy nausea<sup>6</sup>. It is noticeable that in all disciplines, except psychiatry, the presence of somatic pain is a major issue.

In comparison with the results of the study in 2004<sup>2</sup>, the percentage of hospitals, which offered CAM seems to have increased: 51% in this study while it was 43% in 2004 (in both instances within the French-speaking part of Switzerland). Acupuncture was as in 2004 and still seems to be the most frequently used CAM. A therapist explained this success by the fact that these techniques are have been used for thousands of years, also by the good organization of the ASA – Association des sociétés médicales suisses d'acupuncture et de médecine traditionnelle chinoise – and finally by the amount and quality of evidence on the effectiveness of acupuncture in some indications.<sup>6</sup>

A few studies about the use of CAM in hospitals have been performed outside Switzerland. Among the most recent, a Norwegian and Danish study<sup>7</sup> showed that 50% of the hospitals in Norway and one third in Denmark offered at least one CAM. In most hospitals, this CAM was acupuncture. Therefore, we observed some similarities between the French-speaking part of



Switzerland and these Scandinavian countries. Additionally, the American Hospitals Association reported the use of CAM in American hospitals stressing the increase in such use from 7,7% in 1999 to 37,7% in 2008.<sup>8</sup> In Israel, among 24 public hospitals, 10 offered different CAM methods in 2002.<sup>9</sup>

The most striking point revealed by the interviews concerned the terms of implementing CAM in the hospitals. In most cases, such introduction was motivated by the interest of an employee, who obtained the agreement of the director to practice CAM at the hospital. In some instances, the non-medical therapists reported that the support of a physician incited the medical direction to take CAM seriously and thus made its introduction easier. Interestingly, a qualitative Canadian study<sup>10</sup> also stresses the challenge linked with this issue and concludes that it is necessary to change the inclusion's strategy of CAM in hospitals. Moreover, the time devoted to the processing of any CAM was often "hidden" behind the conventional working time of nurses, midwives or physicians practicing it, as if the concerned hospitals preferred not to demonstrate it openly. In other terms, most hospital didn't seem to have developed formal policies as on how to introduce, supervise and evaluate such practices

One single exception to this *modus Vivendi* must be mentioned. In a Department of obstetrics and gynaecology, the introduction of osteopathy was subjected to the same procedure of validation as all the conventional medicine newly adopted in the Department. Moreover, a monitoring of this activity and a measure of its perceived results was set up. This procedure lead to a better sustainability CAM, because it did not depend on a single therapist but was openly institutionalized. This strategy also meant more financial and human resources, but the transparency and the formalization of the process initiated a better acceptance of this therapy and a better collaboration within the staff.

Some biases of this study deserve comments. In the first phase, the questionnaire was sent to the medical directors of 46 hospitals. In four cantons, public hospitals are grouped and organized in one single institution. The questionnaire was thus sent to the medical director of an institution representing several regional hospitals. The weight of the answer of a big hospital was consequently similar to the answer of a small independent institution. Moreover, a decision was made to send the questionnaire to the medical director of each institution, while the Swiss study from 2004<sup>2</sup> showed that they only partially knew the activities of

physicians involved in CAM approaches and were poorly aware of CAM practiced by non-physician therapists. The rates provided in this study are hence probably underestimated, particularly as far as non-physician therapists' are concerned. Some CAM offered seemed not to have been reported by the head of several institutions (probably more often in large multicenter hospitals than in smaller institutions), because of the ignorance of the medical head in respect to CAM. For example, the website of a hospital indicated that aromatherapy was offered for the oncologic patients, whereas the medical director of this hospital did not mention it in the questionnaire. Finally, the qualitative part of the study is subject, as all qualitative research, to various biases such as non representativeness of CAM therapists, recall problems, over or underestimation of some phenomenon.

## **Conclusion**

Our results have however several important implications. First, it seems that the number of hospitals offering CAM - in the French-speaking part of Switzerland at least –is increasing. In the present political context there is no reason why it should not rise further, as observed in other western countries. The policies governing the introduction of CAM in the surveyed hospitals, seems with one exception, poor if not non-existent. The offer is mainly based on the goodwill of the therapists, rather than clinical and scientific evidence. It is extremely disturbing that apparently, the files of patients who received CAM therapy do not make note of these interventions. The introduction of every new health care approach, were it conventional or complementary and alternative, should follow an identical evaluation and validation procedure. Hospitals should also make sure to be able to provide sufficient structural resources to make it possible to monitor the outcomes. This is even easier to justify because, the number of factual and scientific knowledge about CAM<sup>11</sup> has largely increased over the last one or two decades. This effort should be maintained and encouraged, particularly in academic settings, in order to allow for a better evaluation of CAM use, quality of care, costs/benefits and health outcomes in the hospital. The question is of how CAM should ideally be introduced in a hospital. If the process of the implementation of a CAM is the same as for conventional medicine, it could lead to less risk of the interruption of this care when the therapist quits the hospital. In other words, the implementation of a CAM modality in a hospital should not be "ad personam" but rather institutionalized, in the same way as any newly implemented treatment. This remains true for all stages of the evaluation: choice of therapy, pilot introduction, monitoring of undesired effects, costs and outcomes including

benefits in terms of health, wellbeing and quality of life. A follow-up study to interview the patients on their perception and satisfaction level with the use of CAM would be interesting and could be considered for future work.

## References:

<sup>1</sup>Wolf U, Masion-Bergemann S, Bornhöft G, Matthiessen PF, Wolf M., Use of complementary medicine in Switzerland, *ForschKomplementärmed* 2006;13(suppl 2):4–6

<sup>2</sup>Widmer M, Donges A, Wapf V, Busato A, Herren S. The supply of complementary and alternative medicine in Swiss hospitals. *ForschKomplementärmed* 2006;13(6):356-61.

<sup>3</sup>[nccam.nih.gov](http://nccam.nih.gov) [Internet]. National Center for Complementary and Alternative Medicine (NCCAM), 9000 Rockville Pike, Bethesda, Maryland 20892, last update 31 May 2012. Available from : <http://nccam.nih.gov/health/whatisacam>

<sup>4</sup>Office Fédéral de la Statistique, Statistique des hôpitaux 2009 – Tableaux standards, numéro de publication : 532-1101-05. [www.health-stat.admin.ch](http://www.health-stat.admin.ch)

<sup>5</sup>Helmreich RJ, Shiao SY, Dune LS, Meta-analysis of acustimulation effects on nausea and vomiting in pregnantwomen, *Explore (NY)*. 2006 Sep-Oct;2(5):412-21.

<sup>6</sup>Ernst E., Pittler M.H, Wider B., Boddy K., *Oxford handbook of complementary medicine*, 1st ed. New York : Oxford University Press ; 2008 ; p. 42-45

<sup>7</sup>Laila J Salomonsen<sup>1</sup>, LasseSkovgaard, Søren la Cour, LisbethNyborg, LailaLaunsø, VinjarFønnebo, Use of complementary and alternative medicineat Norwegian and Danish hospitals, *BMC Complement Altern Med*. 2011 Jan 18;11:4.

<sup>8</sup> American Hospital Association: Latest Survey Shows More Hospitals Offering Complementary and Alternative Medicine Services. 2008 [<http://www.aha.org/aha/press-release/2008/080915-pr-cam.html>].

<sup>9</sup>Shuval JT, Mizrachi N, Smetannikov E: Entering the well-guarded fortress:alternative practitioners in hospital settings. *SocSci Med* 2002,55(10):1745-55.

<sup>10</sup>Hollenberg, Daniel B.; Tsasis, Peter; and Kelley, Nancy (2011) "CAM in Canadian Hospitals: The New Frontier?," *Journal of Complementary and Integrative Medicine* : Vol. 8: Iss. 1, Article 20.

<sup>11</sup>Graz B, Rodondi PYBonvin E.Existe-t-il des données scientifiques sur l'efficacité clinique des médecines complémentaires?, Forum Med Suisse 2011;11(45):808–813

<sup>12</sup> Perret N. Place des coupeurs de feu dans la prise en charge ambulatoire et hospitalière des brûlures en Haute-Savoie en 2007, Thèse de médecine, Université Joseph Fourier, Grenoble, 2009 ; 16

Number of departments offering CAMs	Medical specialized field	CAM											
		Acupuncture	Manual Therapies	Reflexology	Osteopathy	Aromatherapy	Sophrology	Medical Hypnosis	Mindfulness methods	Art-music-therapy	Secret*	Homeopathy	Naturopathy / Bach Flower
5	Rehabilitation	x	x	x			x			x	x		
4	Palliative care	x	x	x		x	x			x		x	
4	Gynaecology – obstetrics	x			x	x					x		
4	Psychiatry	x						x	x				
4	Anaesthesiology							x					x
2	Orthopaedic surgery					x					x		
2	Oncology	x								x			
2	Internal Medicine	x								x		x	x
2	Not specified				x		x						
2	Paediatrics									x			x
1	Rheumatology		x										
1	Geriatrics		x										
1	Intensive care							x					

\* Healers who play a part in folk medicine, claim they can alleviate the pain due to burns by “talking the fire out” of burns, reduce massive haemorrhages or heal warts, eczema or sprain thanks to a secret incantation: “the power”.<sup>12</sup> They work mostly by phone and do not demand any compensation.

**Table 1** medical specialized field with CAM (hospitals and clinics of the French-speaking part of Switzerland)

<b>CAM</b>	<b>Specialized medical field</b>	<b>Occupation</b>
Acupuncture	Gynaecology-Obstetrics	Physician
Acupuncture	Gynaecology-Obstetrics	Midwife
Acupuncture	Rehabilitation	Nurse
Acupuncture	Psycho-oncology	Physician
Aromatherapy	Orthopaedics Surgery	Physician
Homeopathy	Gynaecology-Obstetrics	Nurse
Osteopathy	Gynaecology-Obstetrics	Midwife
Reflexology	Rehabilitation	Nurse
Reflexology and aromatherapy	Palliative care	Nurse
Sophrology and Manual therapies	Palliative care	Nurse

**Table 2: CAM, medical specialized field of the responding therapists and profession.**

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