Obstetric care: competition or co-operation

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Objective: **the aim of this study was to determine the feasibility of co-operation within maternity and obstetric care between midwives, general practitioners (GPs) and obstetricians.**
Design: **descriptive correlational study.**
Setting: **The Netherlands. Policy is towards more co-operation between primary and secondary health care. However, in Dutch health care midwives, GPs and obstetricians may also have conflicts of interests.**
Participants: **members of obstetric co-operation groups (91 midwives, 53 GPs, 31 obstetricians) completed a questionnaire.**
Measurements and findings: **in the questionnaire information was collected on what members of obstetric co-operative groups expect from co-operation. Findings indicated that consensus existed about experienced advantages and disadvantages of co-operation, tasks that should be achieved, and how obstetric co-operative groups could be set up. Nevertheless, there was evidence of competition and there were also conflicting ideas about co-operation.**
Key conclusions and implications for practice: **it is concluded that the findings have implications for the organisation of an obstetric co-operative group. If professionals want to start such a group it is preferable to start with topics that benefit all participants (win–win situation) and motivate them to participate actively. A second step may be an attempt to reach agreement about how to communicate with each other in the case of referrals and consultations. During this phase mutual trust and respect may grow, so that finally more difficult problems can be discussed (mixed-motives situation).**

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INTRODUCTION

Co-operation in health care is not a new concept. In primary health care integrated health-care centres and teams of general practitioners (GPs), community nurses and social workers are quite a common phenomenon (Boerma 1989, Hingstman & Harmsen 1994). Co-operation between primary and secondary health-care providers, however, is rare. In The Netherlands, an experiment has been set up to stimulate co-operation between midwives, GPs and obstetricians and a study has been carried out to examine the feasibility and success of multidisciplinary co-operation. In this article the term 'obstetric care' is used to refer to the care provided to a woman during pregnancy, labour and the postnatal period, irrespective of whether the woman's experience of pregnancy, labour or the postnatal period is considered to be normal or abnormal.

In The Netherlands women at low obstetric risk receive primary health care (Keirse 1982, Treffers et al 1990, Van der Abraham Mark 1993). Obstetric care in the community is usually given by a midwife, sometimes by a GP. The midwives are fully qualified and licensed to provide independent care to women experiencing normal pregnancy and childbirth. In 1991 about 45% of all births were attended by midwives (CBS 1993). Approximately 63% of all deliveries attended by midwives are at home and 37% are in the maternity ward of a hospital (SIG 1992). In the latter case the midwife, or GP, is responsible for the care. Consequently, the midwife, or GP, plans and provides the total care for women at low obstetric risk, antenatally, natally and postnatally, and only refers to an obstetrician when necessary. Midwives usually practise independently and are paid, per woman, by insurance companies. The amount of payment depends on the duration of the care provided. So, if the midwife refers a pregnant woman to an obstetrician she is paid in proportion for the care provided. If there is a medical indication, obstetric care is given by an obstetrician and most obstetricians are paid consultation. About 38% of Dutch women who start in primary health care are referred to an obstetrician some time between the first contact with the midwife and the delivery of the baby (SIG 1992). So, the quality of the interaction between primary and secondary care may influence good obstetric care.

Three types of interactions between primary and secondary care can take place. Firstly, there

can be an exchange of women. The Dutch system strongly favours primary obstetric care and health insurance does not cover specialist care unless this type of care is deemed to be necessary. However, obstetricians, midwives, and GPs disagree about when a woman at low obstetric risk becomes a woman at high obstetric risk (Riteco & Hingstman 1991). Midwives and GPs more often think that care could be provided outside the hospital and that it is often even better to provide primary care at home because it benefits the course of labour. In the second interaction an exchange of knowledge can take place. Midwives and GPs often want the advice of an obstetrician. This can be done either by telephone or the woman can be referred personally to an obstetrician. If the midwife and GP refer for advice they run the risk of the obstetrician keeping the woman in secondary care. In the third type of interaction there is an exchange or provision of resources such as information about the woman, ultrasound, prenatal screening and a room for hospital delivery under the guidance of primary care. For example, in many hospitals an ultrasound scan requires a referral to secondary care with a risk of losing the woman. However, it is also possible that obstetricians and midwives agree on indications and circumstances in which the obstetrician will always send the woman back to the midwife.

In summary, different kinds of interactions between primary and secondary care take place. As a consequence of the organisation of obstetric care there may be rivalry about women and tasks (competitive interdependence). But primary and secondary care must also complement each other (complementary interdependence).

It is evident that a strict distinction between primary and secondary care is not possible. Adequate secondary care can only exist by virtue of good primary care and vice versa. For example, if a midwife waits too long before referring a woman, it may be more difficult for an obstetrician to obtain a good obstetric outcome. Co-operation between these professionals may contribute to a higher quality of care. In the literature the type of exchanges and competitive and complementary dependencies between group members are often associated with different types of co-operation (e.g. Levine & White 1960, Tjosvold 1986, Jacobson 1989, Hurley & Fennell 1990). For example, if parties predominantly complement each other people may work together to improve the care of an individual woman. This kind of co-operation is considered to be unusual if parties predominantly compete with each other. In such cases participants may co-operate to organise further education, to make agreements on the use of material resources etcetera (Breedveld 1980). When participants have partly contradictory interests (mixed-motives situation) co-operation is also considered to be the best way of interaction. However, all participants can only profit from this co-operation when they trust each other. So, before choosing strategies to achieve co-operation, insight must be gained about why midwives, GPs and obstetricians want to co-operate.

Little is known about the motives of midwives, GPs and obstetricians for co-operating. In The Netherlands an experiment has been begun to stimulate co-operation between midwives, GPs and obstetricians in ten different regions. The professionals in a region form a so-called Obstetric Co-operative Group (OCG). How the co-operation in such a group is brought into practice depends on the wishes of the participants and the likelihood of realising these wishes. This article describes the findings of a study conducted to determine the views of these professionals on co-operation. The objective of the research was to answer the following questions:

1. How much competition exists between midwives, GPs, and obstetricians?
2. Do various professionals experience the same advantages and disadvantages of co-operation?
3. Do they agree upon the tasks that should be achieved by co-operating?
4. Which factors have been experienced as important conditions for achieving multidisciplinary co-operation?

The findings of this study could give more insight into how co-operation could be achieved.

METHODS

The data were collected as part of a research project in which OCGs were set up and evaluated in ten regions in The Netherlands. Each group was offered specialised education by the National Organization of Quality Assurance in Hospitals and was given financial support for administrative and organisational tasks. The education implied regular visits by persons trained to improve group processes and to formulate and implement mechanisms for quality improvement. All obstetricians, midwives and GPs in these ten groups were asked to fill in a postal questionnaire. This article is based on the responses of 31 obstetricians (response rate 77%), 91 midwives (response rate 88%) and 53 GPs (response rate 56%).

There was no existing questionnaire

available for the purpose of this study. A structured questionnaire was designed to assess the participants' personal views on OCGs. To guarantee the validity of questions the concepts were operationalised with the aid of 51 interviews with professionals providing obstetric care. The questionnaire was discussed with experts in obstetric care and scientists and was pilot tested.

The central concepts reported in this paper are experienced competition, advantages and disadvantages, the tasks to be achieved and the conditions necessary for achieving multi-disciplinary co-operation.

Experienced competition

Respondents were asked to rate the competition within his or her own professional group and with the two other disciplines on a five-point scale (ranging from no competition to always). For example, a midwife was asked to rate the competition with other midwives, with GPs, and with obstetricians (3 items). The responses were dichotomised into experiencing at least regular feelings of competition and experiencing no competition or sometimes experiencing competition.

Advantages and disadvantages

Twelve statements referring to possible advantages of co-operation and 13 statements referring to possible disadvantages of co-operation were formulated. Respondents were asked whether they experienced each statement as an advantage or disadvantage.

Tasks to be achieved

Nineteen different tasks were listed. Respondents were asked to indicate whether they found each task very important or of minor importance.

Conditions for realising multidisciplinary co-operation

The interviews undertaken in the pre-pilot work revealed many different aspects which could play a role in achieving co-operation. These aspects were operationalised in 34 statements which were grouped into five clusters: statements referring to how an OCG must be set up (8 items); financial resources (5 items); how information is handed over (5 items); the relationship with organisations, such as hospital management and insurance companies, outside the OCG (5 items); and the attitude of participants and the ability to co-operate (11 items). Respondents were asked to indicate whether they found a condition very important or of minor importance.

Data were analysed using SPSS-PC (version 5.02) and differences between proportions were assessed using the χ^2 test.

FINDINGS

All the GPs gave perinatal care (mean 10 deliveries per year, range 5–60). Most of the midwives were female (91%), whereas most of the GPs and obstetricians were male (respectively 83% and 71%). The average length of time that the midwives had been practising in the region of the OCG was shorter (6.9 years) than the average time of the GPs (13.8 years) and obstetricians (10.8 years).

Competition between midwives, GPs and obstetricians

The percentage of the respondents reporting regular feelings of competition are shown in Table 1. So, competition between midwives was experienced by 22% of the midwives who answered the questionnaire. Only 4% of the midwives experienced competition with GPs, and 13% of the midwives experienced competition with obstetricians. Most competition was felt by GPs towards midwives and between obstetricians and midwives. There is also tension within the professional group of midwives: just under one-quarter of the midwives reported regular feelings of competition towards other midwives.

Advantages and disadvantages of OCGs

The percentages of midwives, GPs, and obstetricians who agree with the advantages and disadvantages of the various items are shown in Figures 1 and 2. For each item a χ^2 test was used to test the significance of the differences between midwives, GPs, and obstetricians. Better interpersonal relationships, an increased quality of care, and greater efficiency were commonly experienced advantages. GPs more often looked at the OCG as a support for their daily practice ($\chi^2 = 13.81$, df = 2, $P = 0.001$), whereas being responsible as a team for the obstetric care and providing more information for the women tended to be somewhat less important ($\chi^2 = 4.93$, df = 2, $P = 0.085$ and $\chi^2 = 6.11$, df = 2, $P = 0.047$ respectively). The majority of the midwives (69%, $n = 63$) also mentioned the possibility to strengthen their position in relation to obstetricians as an advantage, whereas a minority of the obstetricians

Table 1 Reported inter-professional competition experienced in obstetric co-operative groups in The Netherlands

	Midwife ($n=91$)		GP ($n=53$)		Obstetrician ($n=31$)	
	n	%	*n*	%	*n*	%
Competition:						
With midwives	20	22	17	32	3	10
With GPs	4	4	3	5	2	6
With obstetricians	12	13	0		2	6

wanted to strengthen their position in relation to midwives and GPs (33%, $n=10$) ($\chi^2=14.63$, df=2, $P=0.001$). The most frequently reported disadvantage was the necessary time-investments. A number of obstetricians and GPs feared that an OCG would be misused by insurance companies and policy makers ($\chi^2=6.56$, df=2, $P=0.038$ and $\chi^2=6.38$, df=2, $P=0.041$ respectively). Some obstetricians also mentioned the lack of support of their professional group ($\chi^2=7.77$, df=2, $P=0.021$).

Tasks of OCGs

When asked what were the tasks of an OCG most professionals found it very important to detect problems in obstetric care in the region (Fig. 3). They also wanted to integrate the care and reach consensus of opinion about low- and high-risk women. As much primary care as possible was very important for midwives ($\chi^2=25.91$, df=2, $P<0.001$). Obstetricians also stressed the importance of making better appointments for low- and high-risk women. For obstetricians, however, the wish to keep as many women as possible in primary care was of less importance. All obstetricians wanted to detect regional problems, to improve the integration of care, and to inform each other about policy etc. Better communication with each other and further education of the participants were also highly valued. Further education was also valued by the GPs, but the midwives found it less important ($c^2=9.49$, df=2, $P=0.009$). A striking difference was found in the extent that common computerisation of registered care was valued. Most of the obstetricians (72%, $n=22$) mentioned common computerisation as important, whereas only a minority of the midwives (40%, $n=36$) and GPs (22%, $n=12$) did so ($\chi^2=18.92$, df=2, $P<0.001$).

Circumstances that stimulate the formation of OCGs

The final question in the study was addressed to the circumstances which stimulate the formation of OCGs and in general midwives, GPs, and obstetricians agreed upon the items which are relevant. Therefore, only the total percentages are shown in Table 2 and only those

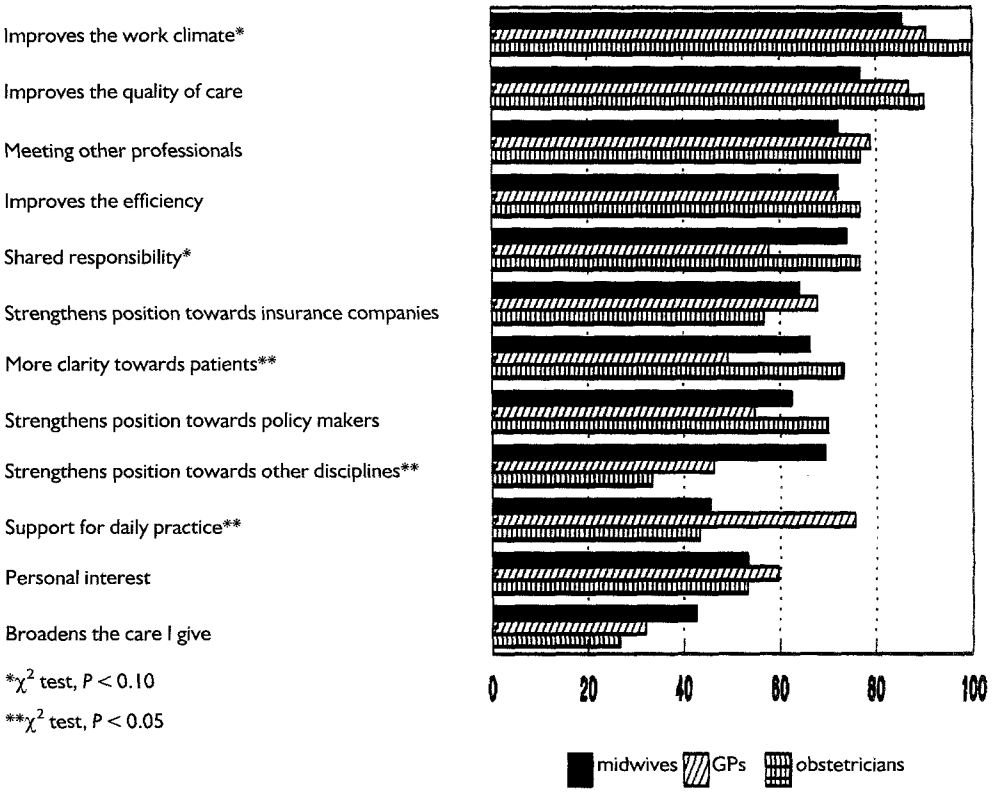

Figure 1 Percentages of midwives ($n=91$), GPs ($n=53$), and obstetricians ($n=31$) who experience the item as an advantage.

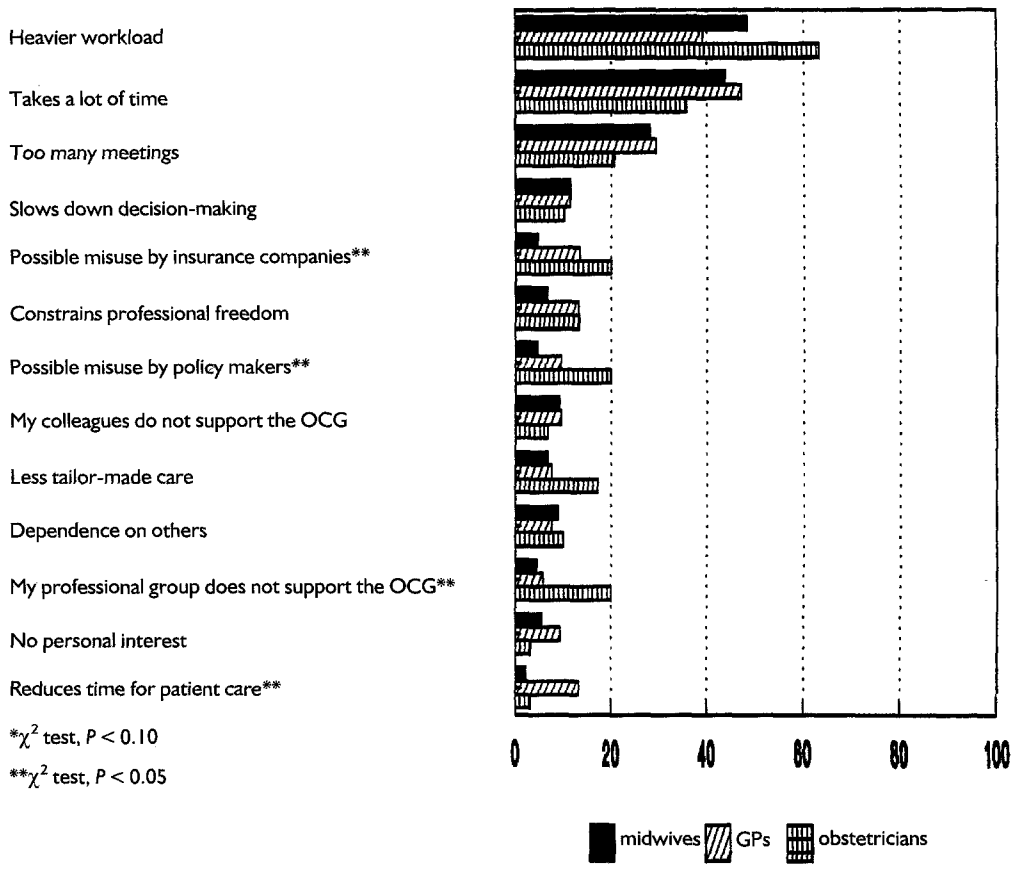

Figure 2 Percentages of midwives ($n = 91$), GPs ($n = 53$), and obstetricians ($n = 31$) who experience the item as a=a disadvantage.

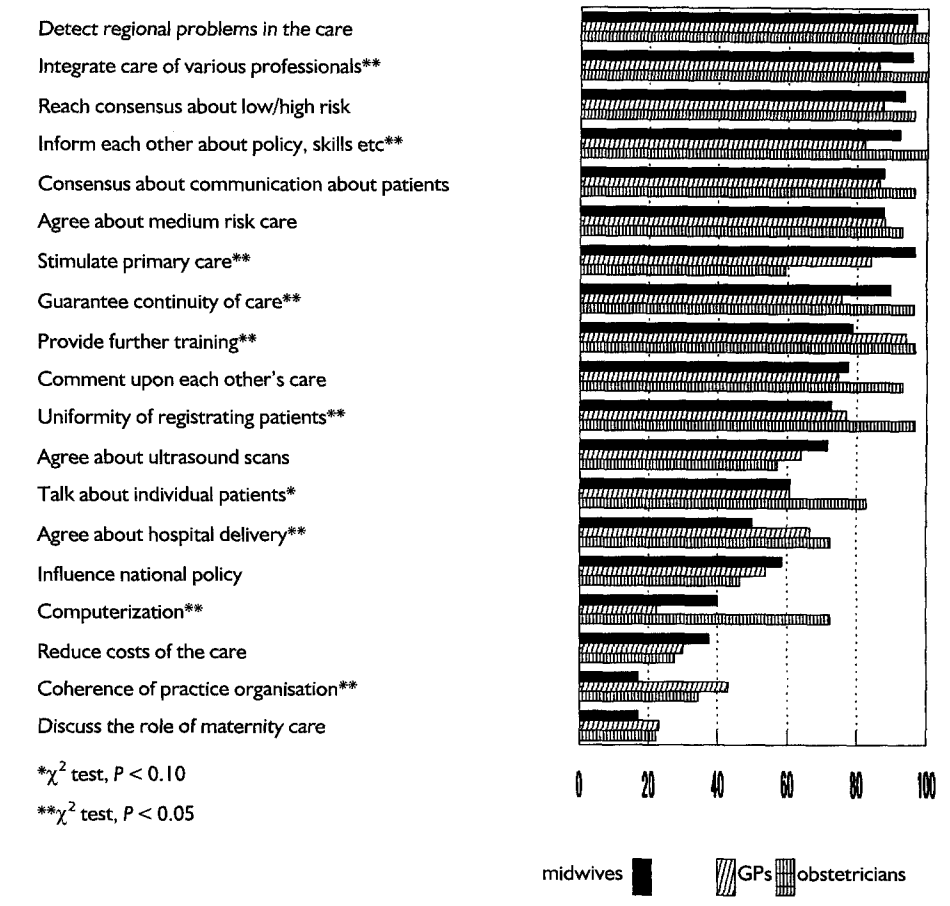

Figure 3 Percentages of midwives ($n = 91$), GPs ($n = 53$), and obstetricians ($n = 31$) who mentioned the item as an important task.

Table 2 Conditions reported by over 70% of respondents as necessary for achieving multi-disciplinary co-operation in obstetric co-operative groups in The Netherlands

Condition	$n = 175$ n	%
Setting up of OCG:		
— good preparation of meetings	166	95
— record of minutes of meetings	166	95
— good chairperson for meetings	156	89
— regular meetings	145	83
Financial support:		
— for secretarial work	138	79
Information flow:		
— good distribution of information and appointments	168	96
— one person responsible for dissemination of information	163	93
— uniformity of case histories	135	77
Support of other institutions:		
— support of own professional group	151	86
Attitude and ability of the group members:		
— trust other's professional ability	168	96
— willingness to co-operate	168	96
— tolerance of others	168	96
— respect for each other	168	96
— openness	163	93
— feeling of shared responsibility	152	87
— willingness to invest time	143	82

conditions considered to be important by at least 70% of the respondents are presented. Respondents valued highly regular meetings that are well prepared and chaired and it was also considered to be important that minutes are taken. Extra financial support for a secretary is helpful because a secretary can send invitations to meetings and write up and circulate the minutes. Extra financial support to compensate for the meetings was not considered necessary for the participants (71%, $n = 124$, not important).

The support of colleagues was an incentive that increased the opportunity of co-operation with other professionals.

However, the attitude of the OCG participants was the most important condition for successful co-operation. Eleven items on the questionnaire referred to the required attitude and ability of OCG members and seven of these items were mentioned by at least 70% of the participants (Table 2). A positive attitude (reflected by trust, respect, openness, etc.) was seen as very important. Abilities such as skills, in conducting meetings were of minor importance. However, the GPs often found these personal characteristics less important than midwives and obstetricians (significant differences, $p < 0.05$, with 6 out of 11 items).

DISCUSSION

The main purpose of this study was to examine the feasibility of multidisicplinary co-operation between midwives, GPs and obstetricians in OCGs. In t his section we will outline what the findings of this study might indicate for setting up and OCG. Considering the most frequently mentioned advantages and disadvantages, it was shown that co-operation within obstetric care implies a mixture of advantages and disadvantages that may be conflicting, such as:

— the wish to improve the work climate and to meet others versus the disapproval of colleagues and the fear of being misused by insurance companies or policy makers;
— improved efficiency versus the required investments of time, the increased workload, and the slowing down of decision making;
— the shared responsibility and possibly improved quality of care versus a reduction in professional freedom.

Furthermore, competition was experienced between midwives and obstetricians and between GPs and midwives. Feelings of rivalry also existed within the group of midwives. In short, there is a mixture of interests making co-operation a rather complicated activity.

This mixture of interests is reflected in the tasks midwives, GPs and obstetricians indicated as being most important. Basically, two sorts of tasks were mentioned, the first being those in which the groups have common interests (win–win situation). For example, midwives, GPs as well as obstetricians wanted to talk about existing problems in the care. Another task that was of equal importance to all participants was the improvement of the communication about women in the case of consultation or referral. All parties win by explicit and clear agreements on how to communicate. Secondly, there are tasks in which parties have (at least partially) contradictory interests (mixed-motives situations). Integration of care and discussing the grounds for secondary care are examples of such tasks and these were highly valued by the participants in this study. However, midwives and GPs wanted to increase primary care. For obstetricians this was less important and a mixed-motives situation may arise. In such a mixed-motives situation benefits for one party tend to go together with losses for the other party. A party may face individual incentives not to co-operate but to behave opportunistically, i.e. in a selfish way that might impair the partner (Raub & Weesie 1991). However, co-operation was considered to be the best choice, which leads to benefits for all parties in mixed-motives situations. Conditions must be favourable to realise co-operation. In our study mutual respect, trust and openness were mentioned to be necessary. Regular meetings and well-functioning information channels were also important conditions.

Therefore, if a group wants to start an OCG it may be preferable to begin with regular meetings in which topics are discussed that benefit all participants (win–win situation). An example is a meeting in which one member of the group, or an invited expert, presents information about a subject that can be discussed afterwards. Participation is rather informal and consensus about policy is not pursued. If small problems are signalled that are shared by all participants, actions can be undertaken to solve these problems, such as too few parking places for midwives and GPs near the hospital. A next step may be an attempt to reach agreement about how to communicate with each other about women: what information should be given to others and when. This can be considered as a first step in integrating care. Difficulties may arise because decisions should be made and participants should have the intention to act in accordance with these decisions. In this phase respect and trust can grow. Gradually, problems in which people have different interests (mixed-motives situation) may be discussed. If such a problem is shared by all OCG members they may become motivated to solve this problem. OCG members may try to reach agreements about when primary and secondary care is necessary and make shared protocols for care. Care is then becoming more integrated. In conclusion, starting an OCG requires caution. An over-enthusiastic start to change obstetric care in the region may lead to an untimely end of the co-operation. Small stems to create a firm basis of trust and willingness to be open and to make compromises is necessary. After all, every OCG member continues to co-operate only if s/he expects to reach her/his private goals.

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REFERENCES

Boerma W 1989 Local housing scheme and political preference as conditions for the results of a health centre stimulating policy in the Netherlands. Health Policy 13: 225–237

Breedveld T 1980 Interdependentie als factor bij samenwerking tussen organisaties. In: Greve de W, Vrakking W (eds) Strategie van samenwerking tussen organisaties in welzijns- en gezondheidswerk. De Tijdstroom, Lochem

CBS 1993 Geborenen naar aard van de verloskundige hulp en plaats van geboorte, 1991. Maandbericht Gezondheidsstatistiek 12: 19–31

Hingstman L, Harmsen J 1994 Beroepen in de extramurale gezondeheidszorg 1994. De Tijdstroom/NIVEL, Utrecht

Hurley R, Fennell M 1990 Management-care systemsd as governance structures: a transaction-cost interpretation. In: Mick S, Associates (eds) Innovations in health care delivery. Jossey–Bass Publishers, San Francisco

Jacobson C 1989 A conceptual framework for evaluating joint venture opportunities between hospitals and physicians. Health Services Management Research 2: 204–212

Keirse M 1982 Interactions between primary and secondary antenatal care, with particular reference to the Netherlands. In: Enkin M, Chalmers I (eds) Effectiveness and satisfaction in antenatal care. Heinemann, London

Levine S, White P 1960 Exchange as a conceptual framework for the study of interorganizational relationships. Adminstrative Science Quarterly 5: 583–601

Raub W, Weesie J 1991 The management of matches. Utrecht University, Utrecht

Riteco J, Hingstman L 1991 Evaluatie invoering 'Verloskundige Indicatielijst'. NIVEL, Utrecht

SIG Zorginformatie 1992 Jaareboek Verloskunde 1991. Utrecht

Tjosvold D 1986 The dynamics of interdependence in organizations. Human Relations 39: 517–540

Treffers P, Eskes M, Kleiverda G et al 1990 Homebirths and minimal medical interventions. Journal of the American Medical Association 264: 2203–2208

Van der Abraham Mark E 1993 Successful home birth and midwifery. The Dutch model. Bergin & Garvey, London