CHAPTER SIX
SUMMARY OF THE FINDINGS OF THE LITERATURE REVIEW

The goal of the literature review has been to collect and critically review information about the prevalence, the contents, and the etiology of maternal filicide-suicide (mfs) ideation in order to determine what role this ideation might play in outpatient, ongoing psychotherapy of depressed and potentially suicidal mothers of young children (dpsmyc) as well as to determine what additional research might be needed and how such research could be structured. The desired outcome is that clinicians will be better able to assess the presence and severity of mfs ideation. Identifying potential risk factors forms a critical part of this.

As there are no studies specifically about mfs ideation, the last three chapters have been devoted to learning more about mothers who had made a fatal or nonfatal suicide attempt after having made a fatal or nonfatal filicide attempt in order to determine what patterns, if any can be identified among these mothers and to what extent there was ideation prior to their act.

In this chapter, I will summarize the main findings of the previous three literature review chapters, and I will do so from the following four vantage points:
1. The clinician’s vantage point, i.e. the clinician working with dpsmyc on an outpatient, ongoing basis who is assessing his or her client for the presence and severity of mfs ideation and wonders to what extent such ideation, if present, might impact psychotherapy, and might be a precursor to actual mfs behaviors.

2. Nature and Quality of information

3. Explanations and Theories

4. Follow-up: what questions need to be further addressed?

In order to help the reader get a good overview of the material covered so far, I have organized the information by vantage points: the clinician who may be more interested in the clinical implications of the research than in the details of the research itself; the researcher who is interested in the details of the process whereby information was gathered, processed and interpreted; and the theoretically oriented person who is particularly interested in explanations and theories that have been proposed in the various studies.

Finally, it is possible that any conclusions presented in this chapter will be altered in light of information presented in chapters 7 and 8.

The Clinician’s Vantage Point

I am specifically assuming the vantage point of a clinician in California who needs an overview of the literature on mfs in order to know when he or she would be allowed or required to breach confidentiality. I am limiting the information to the main findings of the previous three chapters, and more specifically to the studies published in the last 15 years. Comments on the quality of the information will be made in the next section.
Findings of a Definitional and General Nature

- Mfs is different from other types of filicide, especially fatal child abuse. In addition, it is not predominantly a postpartum phenomenon, as some believe. Furthermore, it is also different from those types of homicide-suicide (h-s) which dominate the contents of studies about homicide-suicide, i.e. spousal homicide-suicide of the morbid jealousy variety.

- Different categories can be discerned among mfs mothers based on the extent to which mothers exhibited symptoms of thought disorders prior to their attempt as well as on the extent to which the mfs attempt was prepared well and carried out deliberately.

- There is no information on mfs ideation except what is known about the lives of mothers who made fatal or nonfatal mfs attempts.

- Mfs is regarded as primarily suicide rather than homicide. There is a preconceived plan with two parts, mostly sequential, sometimes simultaneous for filicide respectively suicide. Therefore, in the great majority of cases the motive for suicide after filicide is not guilt or remorse related to a just committed filicide. Despite the similarity with simple suicide and despite the fact that most recent filicide systems have a special category for filicide-suicide, there has been no application of suicidology concepts, not even a comparison between changes in the mfs rate and those in the rate for simple suicide.

Prevalence

- Fatal and nonfatal mfs attempts are rare. The prevalence of fatal maternal filicide attempts followed by a fatal or nonfatal suicide attempt is similar in most countries, and represents a range of one mother per 2 to 8 million of the general population in most developed countries, including the USA. In fact, the majority of prevalence data of the last 15 years are to be found in a range from 1 mother per 3.5 to 6 million of the general population. Japan appears to be the main exception with an mfs rate that might be 5 to 15 times higher than in the West.

- In addition to the narrow range between countries, there also is a certain degree of stability over time. Changes in the mfs rate tend to co-vary with changes in the rate of female simple suicide.
• Filicide deaths associated with a fatal or nonfatal suicide attempt by either parent confirm this picture. The results of most studies are to be found in a range of 0.3 to 0.95 child per million of the general population, with the majority between 0.4 and 0.7 child per million of the general population.

• The percentage of victims of filicide that is accounted for by the fatal or nonfatal suicide of either parent is to be found in a range of 40 to 70% (Bourget & Gagne, 2002; Somander & Rammer, 1991) and has been rising due to reductions in deaths associated with other forms of filicide in several countries. This reduction in the rate of fatal filicide in general appears to be due to improved medical rescue techniques as well as government initiatives with respect to abortion and child abuse.

• There are indications that the number of mothers who attempt to take one or more of their children along in their suicide represents at least 5% of all mothers of young children who make fatal suicide attempts. There are indications that the number of dpsmyc who are experiencing mfs ideation may represent a similar percentage of at least 5%. There is information about the prevalence of suicidal ideation in the USA by gender and age. One study reports that 6.9% of all women between 25 and 34 experienced suicidal ideation during the 12 months prior to being asked about it. (Crosby, Cheltenham & Sacks)

• The percentage of mfs mothers receiving treatment for mental health issues in recent studies is between 70 and 100 (Alder & Polk, 2001; Bourget & Gagne, 2002; Meszaros & Fisher-Danzinger, 2000). Most of them had received psychotherapy, some of them until days before the mfs attempt.

Motives and Classification Systems

Homicide-suicide Classification Systems

Classification systems used for h-s usually include categories for the offender and the victim as well as specifiers in regards to motives (Nock & Marzuk, 1999), and a varying number of other aspects, such as method used, whether the offender was using substances etc. (Hanzlick & Koponen, 1994) Studies about h-s, where both the offender and the intended victim died and that use one of these classification systems usually report a ratio of male to female perpetrators of at least 10 to 1 (Palmer & Humphrey, 1980), and often higher. They also report that almost all females involved killed their children and had an altruistic motive.
Filicide Classification Systems

Classification systems for filicide usually have six (D’Orban, 1979; Haapasalo & Petaejae, 1999; Resnick, 1969) to eight or more (Wilczynski, 1997b) categories that often are based on motive. Mfs mothers making fatal or nonfatal\textsuperscript{106} suicide attempts are usually found in two or three of these categories: altruistic, retaliation and acute psychotic episode/no motive. Mothers making fatal rather than “fatal or nonfatal” suicide attempts in conjunction with filicide are rarely to be found in the acute psychotic episode or retaliation categories.

Recently developed or revised classification systems for filicide usually have a special category for filicide-suicide, sometimes with subdivisions for mothers making a fatal suicide attempt and those making a nonfatal suicide attempt. Some of the classification systems have defined the filicide-suicide category in a manner that it appears that all mfs cases are assigned to it regardless of the mother’s mental state or motive (Bourget & Gagne, 2002).

Meanwhile, a second approach is followed by other systems that define their filicide-suicide category in a way where the suicide motive must have been present prior to the attempt and dominant over the filicide attempt (Alder & Baker, 1997; Alder & Polk, 2001). In classification systems following this second approach, mfs mothers who are in an acute psychotic episode are assigned to a category of extreme psychiatric disturbance.

\textsuperscript{106} While most h-s studies, as just described, only deal with mfs mothers whose suicide attempt was fatal, filicide studies contain both mfs mothers with a fatal suicide attempt and mfs mothers with a nonfatal suicide attempt.
Alder & Baker argued that the alleged loss of control at the time of the attempt that often is associated with mfs acts only explained a relatively small portion of mfs attempts among mothers studied by them (3 out of 11), and that attempts associated with a loss of control often were ill prepared and carried out impulsively rather than deliberately. The eight mothers making fatal rather than nonfatal suicide attempts after their filicide usually had not acted due to a loss of control, and prior to the attempt had not been known to be vulnerable to a loss of control that could represent a danger to self or others.

**Difference between mfs with fatal and nonfatal suicide attempts**

Recent studies (Alder & Baker, 1997; Alder & Polk, 2001; Bourget & Gagne, 2002) that included both fatal and nonfatal suicide attempts showed a clear difference between mothers making a fatal and those making a nonfatal attempt. This was in sharp contrast to several studies (Barraclough & Harris, 2002; Nock & Marzuk 1999) where it was argued that clinically filicides followed by a nonfatal suicide attempt were similar to filicides followed by a fatal suicide attempt.

**Nature and Outcome of Mfs Attempts**

Two basic approaches can be identified in regards to the nature and outcome of mfs attempts as well as a third approach that has elements of both basic approaches.

**Ill prepared, Impulsively Carried out, Survivors**

The first approach refers to mothers who are ill-prepared and carry out the mfs attempt in an impulsive manner. Often they do not kill all intended victims including themselves. The choice of
method appears to be more based on immediate availability than perceived painlessness. In cases of obvious psychotic episodes, it even may be a very violent and painful method. If they have more than one child, they often do not target all their children and, in fact, many mothers only target one child.

**Well prepared and Deliberately Carried out, Mostly Fatal**

The second approach refers to mothers who prepare their mfs attempt well and carry it out deliberately. They usually kill all intended victims including themselves. Most of these mothers use methods for the filicide that are perceived as painless. For the suicide, they mostly use the same method as for the filicide. When they use a different method it tends to be more violent, although not always more lethal.

**Mixed approaches**

The third approach represents a variety of approaches, most of which are similar to the second approach except for a few aspects, and some of which are more similar to the first approach.
The Need for Profiles of Pre-Attempt Mfs Mothers

Combining the information from "Motives and Classification Systems" and "Nature and Outcome of Mfs Attempts" we see two basic profiles of mfs mothers’ lives prior to their mfs attempt and a third profile that represents a combination of elements of the basic two profiles.

Overt Profile

The first basic profile refers to mothers described as ill-prepared and carrying out the mfs attempt impulsively. Often these mothers show behaviors and symptoms prior to their mfs attempt, such as obvious symptoms of a thought disorder, that are so overt that people in their environment know that these mothers are at risk of losing control of themselves. In California, the clinician working with a dpsmyc who would show these symptoms would be allowed and possibly even required to breach confidentiality. The clinician would know that the mother who is at risk of losing control of herself also might be experiencing mfs ideation and, if so, might be in danger of acting on it. In other words, the risks associated with such a mother would be overt. It is also noteworthy that a clinician working with dpsmyc on an ongoing, outpatient basis would not be very likely to have overt mothers in his or her practice, as they might be more likely to be in in-patient treatment. If the clinician did have such a mother as a patient, it would be fairly easy to identify this overt mother as a potential danger.

Covert Profile

The second basic profile refers to mothers who would be assigned to a filicide category associated with altruism rather than retaliation or extreme psychiatric disturbance, and whose mfs attempt mostly fits the description of mothers who are well prepared, carry out their attempt
deliberately, and kill those intended to be killed including themselves. Prior to their attempt these mothers do not exhibit behaviors or symptoms that would make people in their environment, including clinicians, consider them as so vulnerable to loosing control that special interventions would be needed. They can be considered as covert.

Mixed Covert-Overt Profiles. The Notion of a Continuum

The third, mixed overt-covert category may contain several subcategories. It could be the mother whose behavior and symptoms are similar, if not identical, to mothers in the covert category except for the fact that it is known that at some point in her past she made a suicide attempt. In fact, approximately half of mfs mothers whose pre-attempt lives were described in recent studies had made a prior suicide attempt. It was implied in these studies that the clinicians knew about this but there is also a possibility that they did not know about it, and only found out after the fact. Approximately 2/3 of mfs mothers with prior suicide attempts were very similar to mothers in the covert category except for the suicide attempt.

The presence of a mixed covert-overt category can also be seen as an indication of a continuum from clearly covert to clearly overt with many mothers whose profiles contain aspects of both the covert and the overt profile.

Role of Overt and Covert Profiles in Clinical Practice

Knowledge of the lives, behaviors, thoughts, and symptoms of mfs mothers, and especially of the covert ones, is critical for the clinician who needs to assess for mfs ideation among dpsmyc. Dpsmyc presenting with symptoms placing them in the overt category might be relatively easy to
identify and not much additional information might be needed for the identification of mfs ideation. However, most dpsmyc do not present with overt signs, which marks the beginning point of the challenge for the clinician. Many may not experience mfs ideation at all. Meanwhile others may experience mfs ideation in varying degrees but conceal it successfully from the clinician. Knowledge about the lives of mothers who made an attempt at mfs and who could have been considered covert prior to their attempt is, therefore, critical for a clinician who has to assess the dpsmyc for the presence and severity of mfs ideation. If the dpsmyc's life exhibits similarities with that of the covert mfs mother, clinicians should be especially alerted to the presence of mfs ideation in their dpsmyc patients.

**Tentative Profile of Covert Mothers**

Some of the characteristics not infrequently seen in the descriptions of the lives of covert mfs mothers prior to their attempt are the following:

- **Attempt-Related**: pre-attempt communication about intentions; a “standby” suicide note written weeks before the event “just in case”.

- **Demographic features**: age of oldest child younger than seven; age of mother 27-35, most mothers have one or two children, some have three; employed prior to becoming stay-at-home-mother; race (in the USA the rate among white mothers is significantly higher than among black mothers); not lower economic status.

- **Predisposing factors**: Childhood abuse, often psychological, sometimes sexual; first or second-generation immigrant, long-term/chronic emotional problems, and poor marital or intimate relationship, sick or disabled child.

- **Precipitating factors**: abandonment and fear of being abandoned, e.g. by significant other; (the prospect of) loosing custody of children. Abandonment fears may also refer to a generalized fear of annihilation.
• Personality features: The Typus Melancholicus personality type (Okumura & Kraus, 1996): performance-oriented, orderly, very responsible, anxious and hypernomic, or overly inclined to follow rules.

• Mental illness: Mixed anxiety-depression, melancholic features, social anxiety, and rejection sensitivity.

• Other symptoms, thoughts and behaviors: overconcern about the well-being of a child, fear of future; tendency to experience fusion/merger with her child or children; vulnerable to ruminating and ideas of doom and rescue (through mfs). Overall, many covert mothers were high functioning, and had experienced long-term emotional problems.

Characteristics often attributed to filicide and “by association” to mfs that in reality are not widespread among mfs mothers, and most likely largely absent in covert mothers include obvious symptoms of a thought disorder, abuse of children, and substance abuse.

There is a striking similarity between many of the characteristics in the lives of the covert mfs mothers and phenomena that are commonly known as risk factors for simple suicide. This similarity and the effect of the convergence and interaction of various factors will be discussed in Chapter 7, the Vantage Point of Suicidology.

At this juncture, it might also be prudent to remind the reader of certain similarities between the lives of covert mfs mothers and the lives of other mothers of young children who are not experiencing mfs ideation\textsuperscript{107}.

\textsuperscript{107} For instance, Hawton & Roberts (1985) report that 30% of mothers admitted to an Emergency Room after a suicide attempt were found to be abusing their children or to be at high risk of abusing them. However, generally mothers who have made mfs attempts, especially the covert ones, are known not to have been involved in child abuse. Other disorders or syndromes to
Nature and Quality of Information

There are no studies that specifically address mfs ideation or mfs. Information on mfs can be found in studies that deal with filicide or homicide-suicide. This section has three subsections:

- Methods of gathering information
- The manner, in which the information is processed, i.e. how it is measured, interpreted and presented
- The result and consequences of the nature and quality of the information.

Methods of Gathering Information

The studies reviewed in chapters 4 and 5 reflect the results of major improvements in the methods of information gathering during the last 15 years. The most significant of these improvements are the following:

Population Studies. Studies with both fatal and nonfatal suicide attempts.

There has been a greater reliance on so-called population studies where all cases of mfs in a specific area during a specific period were included rather than on selected samples from hospitals or prisons. While older population studies mostly included only mothers who were still alive, some of the recent population studies (Alder & Baker, 1997; Alder & Polk, 2001; Bourget & Gagne, 2002) contain mothers where both the filicide attempt and the suicide attempt were fatal. Additionally, these studies can be included in the context of a discussion of differential diagnosis, including obsessions of infanticide as well as mothers of young children with ideation about simple suicide.
(so-called \textit{ff} cases) as well as mothers where the filicide attempt was fatal and the suicide attempt was nonfatal \textit{(fn)}. The presence of both \textit{ff} and \textit{fn} cases allows for a comparison between these two types that used to be very difficult, if not impossible.

\textit{Increased Use of the Psychological Autopsy Method}

The psychological autopsy method has been increasingly used, and has proven to be especially useful for \textit{ff} cases, which were not included in earlier research studies with the exception of West (1965). The psychological autopsy method pays much attention to people and circumstances in the mother's life during the weeks and months prior to her mfs attempt. Parallel to the increased use of the psychological autopsy method, we have seen increased interest in mfs from the disciplines of criminology and victimology, both of which take a greater interest in the deceased person's environment than traditional psychological approaches.

\textit{Contributions associated with psychiatric evaluations}

There has been a wider and more effective use of psychiatric evaluations for a variety of reasons, especially in Scandinavian countries. For instance, a known suicide attempt in these countries is usually followed by a psychiatric evaluation.

In addition, psychiatric evaluations now follow a more standardized approach, which makes it more feasible to compare their findings over time, if such evaluations have been conducted at various points in a mother's life (which they might be in some countries, especially
after someone has made a suicide attempt) and with the findings of other mothers. The findings of psychiatric evaluations together with findings of psychological autopsy studies have made it possible to gain better insight in the lives and the mental state of mothers prior to their mfs attempt, and possibly at the time of the attempt as well. This is particularly important when an assessment is done after the attempt for legal and/or clinical reasons because at that point there is a tendency to assume that a mother must have lost all control and have been insane to make such an attempt.

Closely related to the increased use of psychiatric evaluations is the fact that in several countries there is much information stored in centralized locations about individuals in general, such as standardized entrance tests for various school types. This information is available for research purposes.

More psychotherapy by covert mothers

There appears to have been an increase in the participation in psychotherapy by covert mothers who later made a fatal mfs attempt. As a result, there is now information available about them that was, in many cases, not available in older studies. The reason for the increase in participation in psychotherapy might be that therapy is more widely available and participating in it is less stigmatizing than it may have been. As a result, covert mothers may seek treatment for anxiety and depression, while in the past psychotherapy was not considered an option.
No major Improvement in Information Gathering in Clinical Interview

As to gathering information in a clinical interview in order to determine the presence of the danger of h-s, Nock & Marzuk (1999) report that the most important aspect of assessing h-s is to be aware of the possibility. This suggests how little prepared many clinicians may be.

Processing, Interpretation and Presentation of Information

While more information is available, it is not necessarily processed, interpreted, or presented in a manner that furthers a better understanding of mfs. Earlier discussed obstacles to processing, interpreting, and/or presenting information include the following:

Differences in the relative size of the age cohort that contains mothers at risk for mfs

For instance, the age cohort of 28-35, which contains most mfs mothers, especially those of the covert type, might account for 10% of the general population in one country and 15% in another country. Yet, in comparisons of the mfs rates of various countries, this difference is not taken into account.

Lack of accurate data due to registration methods

Sakuta (1995) quotes a study by Sato (1979) that suggests that Japanese mfs rates are 5 to 10 times higher than in most Western countries. However, the system of registration of mfs incidents in Japan makes it difficult to make accurate comparisons with other countries. Meanwhile,
in the USA a lack of central registration of h-s events at a federal level as well as in many states results in incomplete data.

*Link between ss and h-s rates ignored*

Meta-studies about trends in h-s rates generally do not refer to the possibility that differences in h-s rates (not just mfs) between countries or changes over time may be influenced by changes in suicide rates. In fact, Coid (1983) suggested this possibility when he pointed out that parallel to the decrease in h-s rates in England and Wales between 1969 and 1979 there was a strong decrease in rates of simple suicide. However, studies about h-s rates do not mention this particular observation by Coid.

*Differences in the explanation and interpretation of mfs incidents*

In many studies in the USA and Canada, mfs incidents were considered primarily as a form of fatal child abuse, referred to as “child abuse gone awry” (Silverman & Kennedy, 1988, p.124). As a result, the number of child victims in connection with parental suicide attempts was not accurately reported and certainly not in a manner that would show that 30 to 50% of the filicide deaths were associated with such suicide attempts. A mechanism that appears to contribute to this distorted picture consists of the practice to record only one offender and one victim in cases of homicide and h-s, including maternal filicide and mfs, even when there are multiple offenders and/or multiple victims. In mfs, almost half of the mothers involved kill or try to kill more than one
child, and more than half of the child deaths due to mfs occur in incidents that involve more than one child.\footnote{108}

\textit{Inaccurate Quoting about extent of fatal suicide attempts}

Many studies refer to the fact that D’Orban (1979) assigned only 24 of the 89 filicidal mothers examined by him to a category of \textit{mentally ill}. However, only few of these studies mention that D’Orban suggested that the mentally ill category would have been much larger, both in absolute numbers and in relation to the size of the other five filicide categories used by him, if mothers who had made a fatal suicide attempt had been included in his study in addition to the current 89 mothers who either had not made a suicide attempt or a nonfatal one.

When studies do refer to the fact that mothers with a fatal suicide attempt were not included in D’Orban’s study, they never refer to the magnitude of the problem. D’Orban, however, reported that mothers with a fatal suicide attempt, as shown in a particular study covering a previous period were almost twice as numerous as mothers making a nonfatal suicide attempt or no attempt.

\footnote{108} The practice of recording only one victim and one offender in cases where there are multiple offenders and/or victims would cause much less distortion in fatal child abuse cases or most cases of spousal h-s, where the number of victims practically always is one because in most h-s studies a dead h-s offender is not counted as a victim.
Mfs lumped together with other forms of filicide

A clear example of the tendency to lump mfs together with other forms of filicide is provided by Holden, Burland & Lemmen (1996). These authors compared 20 filicidal mothers who had been found “Not Guilty by Reason of Insanity” (NGRI) with 8 filicidal mothers who had been found to be Criminally Responsible (CR) in order to examine to what extent the NGRI determination had been applied in a consistent manner. The data on which they based their findings contained information about race, killing of multiple children, years of education and suicide attempts in conjunction with the suicide. The findings did not mention any of these four variables specifically, let alone any connections between them. Careful examination of the data suggests that the five mothers killing multiple children may have been among the eleven who made a suicide attempt, and also might have been white, and with some college education. This typical covert profile would contrast with other mothers in their study who had acted on the basis of command hallucinations and had only killed one child. If the presence of a subset of mothers with these covert characteristics were to be confirmed by further research, it would also confirm that mfs practices and rates among white mothers in the area (Michigan) and during the period studied (1976-1989) would be similar to those in other parts of North America and Europe.

Generalizing/Extrapolating findings of local studies to estimates of national prevalence

Studies about filicide and filicide-suicide as well as about overall h-s in the USA are often conducted in urban areas where there is a large black population. Black women, especially when not part of the middle class, have one of the lowest suicide rates in the USA. Their mfs rate appears to be equally low. At the same time, black women have a significantly higher filicide rate than white women, which according to Goetting (1988, 1990) is a correlate of poverty rather than
race, and which mostly is associated with child abuse. As a result, mfs rates in these urban areas are lower than what is seen in many countries in Western Europe, especially when additional demographic and logistic factors associated with low mfs rates play a role in these urban areas\textsuperscript{109}. In addition, there is a tendency to present mfs data as a percentage of overall maternal filicide or overall h-s\textsuperscript{110} depending on the study. This usually results in a lower percentage for mfs than is seen in other locations than these urban areas because both h-s and filicide have a relatively high prevalence in these urban environments.

Therefore, when estimates of the prevalence of h-s in the USA, both overall and of the component parts, are based on (an extrapolation of) the findings of studies conducted in selected cities rather than on the results of a national survey, and many of these selected cities are the type of urban areas referred to earlier, it can be no surprise that Nock & Marzuk (1999) conclude that filicide-suicide is less prevalent in the USA than elsewhere. It is also interesting that the recent study about child homicide in the entire state of California between 1981 and 1990 shows that the number of filicide victims associated with parental suicide attempts is on the high end of the range in which rates of most countries can be found.

\textsuperscript{109} Other demographic factors might include the relative size of the age cohort (27 to 35) that contains most mfs mothers. Logistic factors could include the number of people, including children, in one household. The larger this number is, the more difficult it might be to prepare and carry out an mfs plan.

\textsuperscript{110} In most countries, and especially in the USA, more than 90\% of h-s offenders are males involved in spousal h-s. Black males participate in this to the same extent as white males. It is also extremely rare for a woman to kill both her husband/partner and herself. As a result, it can be no surprise that Berman (1979) reported that there were no cases of filicide-suicide (by either parent) in his study of h-s in the combined population of Baltimore, Philadelphia and Washington DC during the two-year period of 1974 and 1975, while there were 15 cases of spousal h-s, morbid jealousy variety.
Confusing Numerical Relationships

Many studies report that fewer than 5% of mothers who kill a child under the age of one make a fatal suicide attempt in conjunction with the filicide, while 20% of those killing a child older than 12 months do so. This easily can be misinterpreted, as it happens in some studies quoting these data, to mean that mothers with children under the age of one present less of a risk for mfs. Close examination of the data in some of the studies that allow such an examination show that the actual numbers of mfs cases with a fatal suicide attempt do not differ for mothers with children under 12 months, and those with children between 12 and 48 months. The low percentage among mothers with children under the age of 12 months is mainly due to the relatively higher number of mothers killing their child during its first year as a result of child abuse, postpartum issues, or unwanted births compared to mothers with older children.

Another example of confusing numerical relationships can be seen in studies that report that the relationship between male and female perpetrated h-s in a particular country, for instance England and Wales, has changed and is now similar to that seen in other countries. This manner of presentation could easily obscure the real significance of this change, which consists in the example of England and Wales of a sharp decrease of mfs rates, while the rate of male perpetrated h-s has remained the same.

Cross References, Differentiation, and Disaggregation

A Lack of Cross References. A good example of a lack of cross references in many studies in which mfs is addressed is provided by Haapasalo & Petaejae (1999). These authors include a wealth of variables in their very well researched study about maternal filicide, including filicides followed by nonfatal suicide attempts: stressors, psychological problems, childhood abuse
issues, methods used, and types of filicide, yet they do not make any cross references between these variables. For instance, it would have been very helpful if Haapasalo & Petaejae had provided more specific information on the filicide-suicide mothers, such as the age of the mothers and the children, the number of children targeted and killed, methods used etc. This information could have been compared with other studies that did provide these details.

A Lack of Differentiation. A problem related to cross references is the lack of data needed for cross-referencing. For instance, Coid (1983), who in his metastudy of h-s did not make any references to the gender and age of the perpetrators or their victims, reported that the h-s rates in the 1950's were almost identical in Denmark and Philadelphia without mentioning that h-s in Denmark consisted mainly of mfs and in Philadelphia of spousal h-s perpetrated by males. The notion that such similar rates could go hand in hand with such differences in the contents of h-s was not alluded to. It is also interesting that more recent studies (Nock & Marzuk, 1999, Milroy, 1995a) that refer to Coid did not note this phenomenon, especially because there are indications that the initially identical rates may have diverged considerably.\footnote{Rates of spousal h-s, morbid jealousy variety, have increased in the USA (Milroy, 1995), which is likely to have affected the h-s rate in Philadelphia. Meanwhile the mfs rate in Denmark, which was by far the highest in Europe prior to the mid 1960's and was associated to some extent with the use of toxic coal gas and a lack of effective birth control, appears to have decreased. Further research about the situation in Denmark with respect to mfs rates is needed to provide relevant details.}

The Need for Disaggregation of Data. Disaggregation refers to the practice, where the contributing components of findings are reported separately allowing for a comparison of variables and categories of persons that was not possible before. Disaggregation has played a major role in this dissertation and occurred when I re-examined the findings of certain studies. For instance,
D’Orban’s (1979) study about maternal filicide included a category of *mentally ill* that contained 24 mothers, of whom 13 had made a suicide attempt. Yet, the data that were presented about these 24 mentally ill mothers did not distinguish between the 13 mothers who had made a nonfatal suicide attempt and the 11 mothers who had not made a suicide attempt. Re-examination of the data and a comparison with data in similar studies allowed me to make certain tentative suggestions about differences between the mothers who had made a suicide attempt and those who had not. These suggestions included the possibility that the diagnosis of reactive and neurotic depression may have been typical of many of the suicidal mothers, while a diagnosis of postpartum psychosis may have been typical of half of the mentally ill mothers who had not made a suicide attempt. These suggestions, when confirmed by further research, would be particularly relevant in light of the assumption made in several studies\(^{112}\) that for mfs to occur the mother must have been seriously mentally ill and probably insane.

A related aspect to disaggregation refers to the potential for improved risk analysis (Pritchard & Bagley, 2001; Stroud & Pritchard, 2001). For instance, if mothers in ongoing, out-patient psychotherapy who made a fatal suicide attempt after a filicide were all 27-35 years old, with three children under the age of seven, a college education, and not involved in substance or child abuse, it might be easier for a clinician to identify which dpsmyc could be at risk for mfs ideation. Adding more variables could further improve the risk analysis.

\(^{112}\) This includes studies referring to D’Orban (1979)
Use of the terms mental illness, psychiatric disorders, insanity, psychosis, and psychotic identification

Especially in older studies, the term mental illness was used frequently. However, it was often not clear whether the author meant ‘any psychiatric disorder’ or ‘insanity’. When they were using the term insanity, it often was not clear whether they meant insanity as in “Not Guilty because of Insanity” (NGRI) or as a serious symptom of a thought disorder. For instance, Haapasalo & Petaejae (1999) report that 63% of 33 non-neonaticide filicidal mothers were regarded as not legally responsible for their act due to insanity, while only 30% of them were known to have been suffering from psychotic symptoms prior to the mfs attempt.

As to the term psychotic identification, the way some authors define it suggests merger or fusion rather than psychosis.

Lewis, Baranoski, Buchanan, & Benedek (1998) report that 14 out of 15 filicidal mothers who had used a knife or a firearm to kill their child, were

- psychotic
- had “high rates of psychotic symptoms” (Lewis et al., p. 617)
- were exhibiting the kind of psychotic symptoms that can be identified, monitored, and treated.

As a result, Lewis et al. imply that there is a category of low rates of psychotic symptoms. These authors may also imply that it might not be as easy to identify, monitor or treat psychotic symptoms that are different from the “high rates of psychotic symptoms” seen in these weapon using mothers. However, the authors do not elaborate on this.
The Quality of Information and the Degree of Understanding of Mfs

Descriptions of mfs behavior have become much more accurate and complete due to improvements in information gathering. As a result, the earlier tendency, which was particularly common in the USA, to explain all filicide in terms of fatal child abuse or postpartum conditions and, concomitantly, to ignore the specific characteristics of mfs has lost much of its strength. Yet, it remains hard to understand that the insight that mfs was primarily suicide has not led to a wider application of concepts of suicidology. Meanwhile, the increased knowledge about the lives of mfs mothers and especially those with a fatal suicide attempt has revealed many aspects that commonly are regarded as risk factors for simple suicide among women. This may encourage further application of suicidology concepts. This dissertation can be seen as part of this effort.

The improved quality of the information has also made it clear that the percentage of filicide deaths that are associated with parental fatal or nonfatal suicide attempts has been increasing in most countries, while the absolute numbers of such deaths appear to have remained stable. The relative increase of filicide deaths associated with parental suicide is mainly accounted for by the fact that fewer children are now dying as a result of other forms of filicide due to a variety of factors such as improved birth control, legalization of abortion, the success of programs to reduce child abuse and improved medical rescue technology. This increased (relative) prominence of filicide-suicide deaths in statistics about the prevalence of filicide may provide additional motivation to learn more about filicide-suicide, including mfs.
Explanations and Theories

Early explanations of mfs

Schizophrenia and/or displaced aggression were considered necessary conditions for mfs to occur. Not much of an effort was made to explain which type of patients suffering from schizophrenia and/or vulnerability to expressing displaced aggression were most at risk for mfs or what factors might be responsible for triggering mfs behavior. In the 1950’s and 1960’s this started to change. Studies containing descriptions of the mothers’ thoughts and behaviors during the years prior to their mfs attempt started to include references to the following phenomena (McDermaid & Winkler, 1955, Tuteur, 1959, West, 1965):

- feelings of inadequacy as a mother
- overconcern for the child’s well-being, including fears that something could happen to it
- the presence of sickness or disability in the child
- feelings of being overburdened, and being trapped

In addition, there is a good deal of attention for symptoms that suggest the presence of:

- mixed anxiety and depression
- rejection sensitivity
- Fear of the future, including a sense of a foreshortened future.
- Ideation about simple suicide and nonfatal suicide attempts
- childhood experiences that included feeling that one was not properly mothered as a child and/or that one is not loved/accepted by an important person in one’s family of origin
- the notion of altruism
It appears that circumstances increasing a mother’s vulnerability have received more attention. The possibility that displaced aggression or schizophrenia might have played a role was not ignored but the presence of both or either was no longer a necessary or a sufficient condition.

However, many older studies as well as some recent ones (Bourget & Gagne, 2002) would refer to the presence of psychotic symptoms when describing mothers who were experiencing delusions of altruism. Meanwhile, other studies (Alder & Baker, 1997; Alder & Polk, 2001; Meyer & Oberman, 2001) prefer to speak of ideas of altruism because they do not recognize a psychotic element in these ideas, at least not in the mothers that were included in their studies. In fact, I have argued that what some studies refer to as delusions of altruism or doomsday delusions would be regarded as superstitions or cognitive distortions that, although serious, may not be all that uncommon.

As to the notion of altruism as a motive, it reflects the belief that the mother would kill a child thinking it would be better off dead in light of the bleak future the mother saw in store for the child, especially if she were to commit suicide without taking the child along. This particular line of thinking by the mother was widely recognized as playing an important role despite some disagreement about the question to what extent this type of motive should be designated altruistic because mfs could be considered as a syntonic act carried out by the mother to deal with her own problems.

The only one of the older studies that proposed an overarching explanation for phenomena associated with altruism, filicide and mfs was presented by McDermaid & Winkler (1955). These
authors coined the term Child Centered Obsessional Depression (CCOD), which focused on the overconcern these mothers would exhibit, the reasons underlying it, and the consequences it could have among those who were particularly vulnerable.

**Mfs explained as form of child abuse**

In the 1970's and 1980’s many studies, especially in the USA, explained all filicide, including mfs, as a result of child abuse that accidentally resulted in death or as a result of postpartum issues. Suicide was not discussed as a primary motive, although it was associated with 30 to 50% of the number of children dying as a result of filicide.

**Resurfacing of role of suicide**

In the 1990’s altruism and the role of suicide resurfaced. As a result, recent studies now have a separate category for filicide-suicide, where most, but not all mothers had altruistic motives. These studies described several characteristics of the mothers’ lives and suggested that some of them may have played a role, such as a bad marital relationship, abandonment (fears), or issues around immigration.

**First overarching theory of (some forms of) mfs behavior**

Okumura & Kraus (1996) were the first to publish a study that focused exclusively on mfs mothers who had survived their suicide attempt. They also were the first after McDermaid and Winkler to propose an overarching explanatory framework for one of the three subgroup of mfs mothers that they distinguished and which they referred to as *endogenously depressed*. This framework was organized around the *Typus Melancholicus (TM)* personality type, of which the
characteristics are performance-oriented, orderly, very responsible, anxious, and hypernomic (overly carefully adhering to rules out of fear to violate them). An attempt at mfs by these mothers usually was based on altruistic motives. Considering the characteristics of the TM personality, it can be no surprise that the altruistic motive was based on the mother's perception of not being able to meet expectations that society or those in her immediate environment had of her in addition to believing that not meeting expectations would be disastrous for herself and for her children.

Okumura & Kraus described how the lives of mfs mothers in this particular subgroup may have been shaped by the TM personality in a way that they had become vulnerable to experiencing ideation about simple suicide, and after becoming a mother, about filicide-suicide. The authors described the mothers' needs to identify with other persons and impersonal social roles and the concomitant inability to build a solid sense of self. In many cases these identification processes led to women who as adults were high functioning and meeting the expectations of society, although the mothers themselves may not have been convinced of that and may have perceived themselves as barely adequate. In their role of mother, their lack of a solid sense of self caused them to experience their child as an extension of themselves. This led to the assumption that whatever was bad about the mother would also apply to the child. When anxiety about this led to feelings of doom, the mothers increasingly believed that suicide would be the only solution. Because the child was experienced as part of their self-the authors speak of an extended self-the child would automatically be included in a suicide attempt. The authors speak of a psychotic identification between mother and child that accounts for the mfs behavior. However, it appears that what the authors describe as psychotic identification is rather similar to what has been referred to in the
literature as merger or fusion behavior that often is associated with women who are suffering from a Borderline Personality Disorder.

The description that Okumura & Kraus give of mfs mothers with a Typus Melancholicus personality constellation strongly resembles the description of mfs mothers whose life, prior to their mfs attempt, exhibited a covert profile. Considering that the TM profile describes characteristics often seen in people who are in outpatient, ongoing psychotherapy, we can expect that many dpsmyc who are in therapy will fit the description of the TM profile. There is a possibility that needs further research that a Typus Melancholicus personality profile is a necessary, but not sufficient condition for the presence of mfs ideation among dpsmyc who do not have an overt profile. Knowledge about the contents of a TM personality type may be of help to clinicians working with dpsmyc who need to assess for the presence of mfs ideation.

Additional Explanations

Additional explanations (Alder & Baker, 1997; Alder & Polk, 2001; Meyer & Oberman, 2001) focus on the expectations that society has of motherhood and the burdens that this might impose on some mothers who are not in a position or think that they are not in a position to meet these expectations.

Another aspect of recent explanations is highlighted as the convergence of mental health issues, personality features, current stressors, as well as predisposing and precipitating factors. The most important feature of even the recent explanations is the absence of an effort to make use of what has been learned about simple suicide despite the acknowledgement that mfs is primarily
suicide rather than homicide. Starzomski & Nussbaum (2000) who applied the escape theory of suicide (Baumeister, 1990) to spousal h-s, morbid jealousy variety, may be signaling the beginning of a trend. In the next chapters, I will explore to what extent Starzomski & Nussbaum’s theory might be applicable to the study of mfs.

Further Research

The literature review has enabled me to suggest a profile of mothers in outpatient, ongoing psychotherapy who might be experiencing mfs ideation. Further research is needed to validate or alter this profile. Specific attention is needed for improved prevalence data: the percentage of suicidal mothers who take one or more of their children along and the percentage of mothers with suicidal ideation who are also experiencing mfs ideation. In addition, more research is needed about the usefulness and validity of concepts that have been proposed by me, especially

- the notion of different profiles for covert, overt and mixed covert-overt mothers
- the importance of characteristics associated with the Typus Melancholicus personality profile
- the notion of the importance of convergence and interaction of specific stressors, predisposing and precipitating factors, personality features and specific symptoms of psychiatric disorders
- the applicability of suicidology concepts

Most of the aspects of mfs that need further research will be addressed in the next three chapters, of which the role and contents already were discussed in chapter One.