Child Death Overview Panel
Annual Report 2019-2020

Version	Author/Editor	Date
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Warwickshire County Council

Coventry City Council

Solihull Metropolitan Borough Council

NHS Birmingham and Solihull Clinical Commissioning Group

NHS South Warwickshire Clinical Commissioning Group

NHS Warwickshire North Clinical Commissioning Group

NHS Coventry and Rugby Clinical Commissioning Group

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Every child death is a tragic loss and whereas this will always be the case the Child Death Overview Panel (CDOP) seeks to learn from deaths with the goal of reducing child death in the future.

CDOP Aims and Purpose

The CDOP review is intended to be the final scrutiny over a child's death. This involves multiagency panels and core competency professionals that assess the information supplied. The aim is to provide a complete picture of the child's death and living circumstances.

Once the information is collated and processed, panel members can analyse, discuss and identify factors that can be altered to prevent future child death. The overarching purpose is to use professional scrutiny to identify actions and learning to reduce child mortality.

CDOP aims to review deaths through an independent and enquiry-based methodology and share learning from analysis across services in Coventry, Warwickshire and Solihull..

Statutory Partnerships

This Coventry, Warwickshire and Solihull CDOP (CWS—CDOP) is comprised of seven statutory partners, The statutory partners are: Warwickshire County Council, Coventry City Council, Solihull Metropolitan Council, NHS Warwickshire North Clinical Commissioning Group, NHS South Warwickshire Clinical Commissioning Group, NHS Coventry and Rugby Clinical Commissioning Group and NHS Birmingham and Solihull Clinical Commissioning Group.

Warwickshire, Coventry and Solihull CDOP is a member of the West Midlands Regional CDOP group aswell as being part of the National Network of CDOP, enabling participation and the sharing of learning both regionally and nationally.

CDOP was established in 2019 to meet with the revised Working Together 2018 guidance. The CWS CDOP reviews over 60 deaths per year.

The new arrangements to which this CDOP now operates can be found through accessing: https://www.coventryrugbyccg.nhs.uk/mf.ashx?ID=c559fda3-eeec-4811-b1e2-3a317ac19214

Glossary

CDOP	Child Death Overview Panel
ECDOP	Electronic platform for Child Death Overview Panel
SUDIC	Sudden and Unexpected Deaths in Infancy or Childhood
CDRM	Child Death Review Meeting
PMRT	Perinatal Mortality Review Tool
LLC	Life-Limiting Condition

Executive Summary

During this reporting year there were a total of 9 panels held and 75 cases reviewed. Of the 9 panels, their compositions were as follows;

Of the 75 deaths reviewed 45 were from Warwickshire, 22 were from Coventry and 8 were from Solihull. The division of cases reviewed by area are comparatively similar to the division of annual deaths per area.

In totality, 20 of the deaths were considered to have modifiable factors and 55 were concluded as not having modifiable factors. Warwickshire death reviews identified 14 of the 45 cases with modifiable factors, Coventry identified 3 deaths with modifiable factors out of 22 cases reviewed and Solihull identified 3 deaths with modifiable factors out of 8 cases reviewed. Modifiable factors are defined as the factors in a child's death that could be altered or changes in further cases to improve the chances of reducing childhood deaths.

The age groups of child death are divided into six bands, with the general trend of child deaths being primarily neonatal or perinatal. 62% of all deaths reviewed during 2019-20 occurred in under one-year olds; 41% occurred in the neonatal period (<28 days old) and 21% occurred after the neonatal period (28-364 days). In deaths reviewed with modifiable factors, there was a more even split between most age groups (ranging between 20% and 33%), with the only outlier being the age group of 5-9 years old.

A modifiable factor is defined where, if actions could be taken through national or local interventions, the risk of future child deaths could be reduced. The main learning from analysis of the cases indicates three areas of learning:

· For deaths in babies under 1 year of age - the modifiable factors were:

- Maternal Smoking
- Maternal Body mass Index (BMI) of over 30
- Drug and Alcohol use
- Unsafe sleeping
- Consanguinity (children born with medical challenges due to close relatives reproducing children)
- Domestic Violence and Abuse.

In some cases, these modifiable factors were considered to have contributed to the neonatal and perinatal deaths. And actions were taken to share this learning with antenatal providers.

· Domestic violence and abuse is deemed to be a modifiable factor even when it is not the direct cause of death on the grounds that maternal stress may be a contributing factor to pre-term delivery and adverse outcomes for the child. Similarly, smoking and maternal BMI outside of the recommended BMI for the mother were also modifiable factors due to the impact on foetal well-being .

In children over the age of one, factors relating to early identification of sepsis and agency response to road traffic deaths were identified as the main modifiable factors. There were further modifiable factors involving actions to intercept childhood exploitation and how they have changed to reflect the change in needs. Identified learning will reinforce the current guidelines for sepsis recognition and treatment. This learning is in the process of being shared through CSW CDOP actions and is planned to be shared via practitioner links and an upcoming CSW CDOP website.

Introduction

Child Death Overview Panels (CDOP) were created in 2011 by the Government as a final process for reviewing the deaths of all children from birth to their 18th birthday who resided within the UK. The main functions of CDOP are to collate information from the services involved in the life and death of a child and to review the circumstances of the child's death. This involves reviewing the support and services provided to the child and their family in order to identify possible modifiable factors[1] and ultimately, to reduce the potentially preventable deaths of children in the UK. CDOP does not review still births or legal terminations of pregnancy. The overarching aim of CDOP is to deduce learning that will reduce childhood mortality. The formal functions of CDOP are:

- Reviewing all child deaths from birth to 18 years in Warwickshire, Coventry and Solihull excluding those babies who are stillborn and planned terminations of pregnancy carried out within the law;
- Collecting and collating information on each child and seeking relevant information from professionals and, where appropriate, family members;
- Discussing each child's case, and providing relevant information or any specific actions related to individual families to those professionals who are involved directly with the family so that they, in turn, can convey this information in a sensitive manner to the family;
- Determining whether the death was deemed preventable, that is, those deaths in which modifiable factors may have contributed to the death and decide what, if any, actions could be taken to prevent future such deaths;
- Making recommendations to the relevant Provider, Children's Safeguarding Partnership (and Health and Well Being Board) so that learning and education/public awareness campaigns can be taken to prevent future preventable deaths.
- Identifying patterns or trends in local data and reporting these to the relevant Children's Safeguarding Partnership and Health and Well Being Board;
- Where a suspicion arises that neglect or abuse may have been a factor in the child's death, referring a case back to the Children's Safeguarding Partnership for consideration of whether a Safeguarding Practice Review (SPR) is required;
- Agreeing local procedures for responding to unexpected deaths of children; and
- Cooperating with regional and national initiatives; e.g. with the National Clinical Outcome Review Programme – to identify lessons on the prevention of child deaths.

This CDOP report outlines the analysis of cases and the main conclusions derived from panels held in Coventry, Warwickshire and Solihull during the period from 1 April 2019 to 31 March 2020 and shares how learning has been undertaken.

Child Death Review Meetings

Through collaboration, CDOP has sought to strengthen the hospital-based 'Child Death Review Meetings' (CDRM's), as each child is discussed at CDRM prior to CDOP. There is further work planned to ensure CDRM's are hosted entirely by the virtual CDOP platform (ECDOP) which will report to the National Child Mortality Database (NCMD).

[1] Those in which modifiable factors may have contributed to the death. These are factors defined as those, where, if actions could be taken through national or local interventions, the risk of future child deaths could be reduced.

Area Key Themes

Warwickshire
There were 3 key themes identified:
- High maternal BMI within pregnant mothers;
- Children were dying due to inherited illnesses within consanguineous parentage;
- Smoking during pregnancy.

Recommendations
Analysis from records indicated that mothers would state that they were not smoking in pregnancy despite evidence that there was Carbon Monoxide (CO) in the antenatal testing. It is recommended that maternity services should review this finding and explore how they can support mothers to access smoking cessation services.

Other recommendations are general and relevant across the CDOP geography. These recommendations are included in the following page.

Solihull
The key modifiable themes were:
- Maternal Smoking during pregnancy
- High BMI's in pregnant mothers
- Domestic Violence and abuse being present within the household.

Recommendations
Continuity of work on maternal smoking and maternal fitness would be beneficial. With new work having been put in place in 2020 the longevity of this should be seen in future years.

Other recommendations are general and relevant across the CDOP geography. These recommendations are included in the following page.

Coventry
The key modifiable themes were:
- Hospital based learning with planned antenatal care. This was identified as the hospital review was not a part of the CDOP process. CDOP was assured that the hospital was leading on the actions and learning linked to this process.

Recommendations
The hospital-based Child Death Review Meeting had identified missed opportunities within the planned antenatal care plan. As this was learning within the hospital setting this will be addressed by the provider and therefore would not need to be carried forward by CDOP.

Other recommendations are general and relevant across the CDOP geography. These recommendations are included in the following page.

Key Modifiable Themes (further information)
In all three geographical areas, key themes in this reporting year represented a continuation of themes previously identified. This was despite notable actions taken as a result of learning from previous reporting years. The actions that have been undertaken are explored and explained within the actions section of this report.

Smoking in Pregnancy
These actions included noting the recording of smoking and CO status and identifying where recordings had not been made. CDOP enquired as to how this process was going to gain more rigor and was informed that a antenatal audit of smoking recording was underway and the results of this shall be shared. Alongside the audit, hospitals have been sharing best practice reminders and training relating to smoking in pregnancy antenatal recordings and referrals. Once the antenatal smoking audit has been received by CDOP it will be taken to the panel for further consideration and likely referred to commissioning and providers for action planning.

Consanguinity
In this year's annual reporting, consanguinity has become a theme within Warwickshire, having been a theme in both Coventry and Warwickshire in previous years. CDOP is currently bringing forth an action to scope how to target the most affected communities with a provision of advice from community leaders. This is a piece of work that is ongoing and will require review as actions are taken. CDOP actions and development are frequently ongoing as they develop through action and information, the current stage of this action is awaiting guidance from a service within this CDOP area as a framework to discuss for best practice with commissioning.

Unsafe sleeping

Within this report there have been noted modifiable factors involving unsafe sleep , this has coin - cided with a rise in reported deaths linked to unsafe infant sleeping (not reviewed within this re- port). This is a growing theme and work has already been undertaken, including CDOP presentations to CAPT (Child Accident Prevention Trust), exploratory reporting to commissioners and involvement in discussions for further campaigns and actions. Further work is planned to continue with this theme.

Self-Inflected Deaths

There were two cases of self-inflicted deaths in 2019/20, both of these were deemed to have no modifiable factors. However, CDOP received notification of a further five cases of self-inflicted deaths that have not been taken to panel as of yet but will inform learning for the 2020/21 re- porting year. Early indications suggest a rise in this type of death within the locality, particularly within Coventry and Warwickshire. CDOP has produced analysis on these types of deaths and is scoping the local provision of mental health support. Further work is planned to continue with this theme.

Recommendations and Next Steps for 2020/21

This CDOP recommends the following actions to explore and address the thematic trends.

- Smoking and Domestic Violence and Abuse- In partnership with commissioners and Providers, scope how antenatal activity captures smoking and domestic violence, alongside consideration as to what support is offered to provide assurance.

- High BMI in Pregnancy: In partnership with commissioners and Providers, review healthy eating programme provisions for pregnant women within the locality.

- Safe sleeping: In partnership with the Safeguarding Partnerships, commissioners and Providers, a review of safe sleeping messages to be undertaken with particular focus on the demographic and trends of parents not following safe sleeping advice. A communications review should be undertaken to examine how best to affect change.

- Self-Inflicted Death: In partnership with commissioners and Providers to scope the child mental health service provision to examine potential gaps within the local provision or identify missed opportunities to offer interventions. Furthermore, surveillance methods of suicide and self-harm attempts should be examined to identify local trends of children at risk of this type of death.

- Consanguinity: In partnership with the community, commissioners and Providers explore how to best support the understanding and the risks of consanguineous conception.

- Strengthening the Child Death Review Meeting (CDRM) process: CDOP will continue to work with local CDRM providers to ensure the provision of reporting remains consistently best practice and to aid transitions onto the virtual-CDOP platform.

- There is a potential emerging trend that there may be a higher ratio of self-harm related deaths within Autistic Spectrum Disorder/Attention Deficit and Hyperactivity Disorder and Lesbian, Gay, Bisexual and Transgender children. This theme has been identified through child death nationally and explored through peer reviewed reports for many years. In the last three years CDOP report years, locally the majority of self-harm related deaths were with children either possessing or suspected to possess one of the aforementioned characteristics. This CDOP has adapted its form of analysis to include the monitoring of these factors

1. Annual Overview

1.1. Number of panels and reviews

A total of 9 panels were held across Coventry, Solihull and Warwickshire (CWS) during 2019-20 in which 75 deaths were reviewed as completed and closed in the table below. This reporting year the transition between area based and theme-based panels occurred, meaning that panels between April and September were area focussed and October- March were themed. As a result of this transition, no Warwickshire panels were held this year.

Area	Panels held 2019/2020
Coventry	2
Solihull	1
Warwickshire	0
Life Limiting Condition	1
General	2
Neonatology	2
Sudden and Expected Death in Infancy and Childhood	1
Total	9

Table 1 CWS CDOP Report 2019-2020

In September 2019, the CDOP process moved from an area based review to thematic panels that includes Life Limiting Conditions, Neonatology and Road Traffic/Sudden Unexplained Deaths. In addition, a General Panel is scheduled to be held every 3 months so that compliance of reviewing non-themed cases can be maintained. For more specialist cases that do not fit into the identified thematic panel, there is scoping being undertaken regionally to provide a platform to analyse any learning. The thematic panel year set out a plan of 12 panels per year and is as follows:

Month	**Panel Details**
September	Life Limiting Condition Panel
October	Neonatology Panel
November	General Panel
December	Road Traffic/ Sudden and Unexpected Death Panel
January	Life Limiting Condition Panel
February	General Panel
March	Neonatology Panel

Table 2 CWS CDOP Report 2019-2020

Of these 75 deaths reviewed, 19 (25%) were assessed as having modifiable factors. This proportion was higher in Solihull (70%), although there were smaller numbers in total so the data reflects the area's population. None of the child deaths reviewed by Warwickshire, Coventry and Solihull CDOP in this year, were recommended for a Serious Case Review/Safeguarding Practice Review.

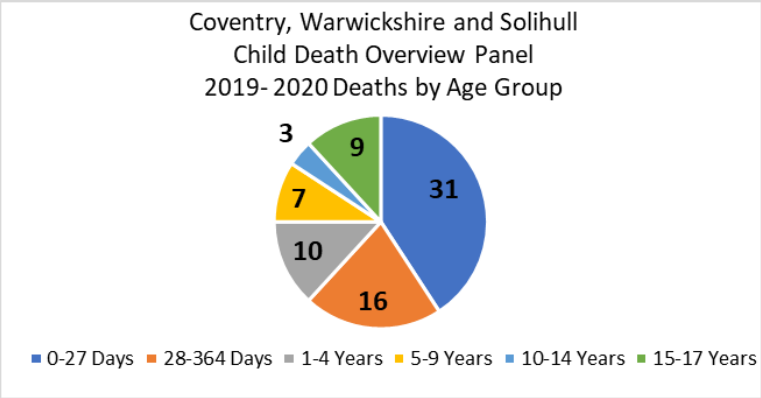
Area	Modifiable (% of deaths)	Non-Modifiable (% of deaths)	Total	% of total deaths
Coventry	3	19	22	14%
Warwickshire	14	31	45	31%
Solihull	3	5	8	37%

Table 3 CWS CDOP Report 2019-2020

2. Demographic Data Analysis

2.1. Age

Of the 75 deaths reviewed within this CDOP during the 2019-2020 reporting year, the highest amount of deaths occurred within the neonatal and perinatal stages (under 1 year of age). This age group accounted for 62% of all deaths reviewed during 2019-2020. 41% of all of the years reviewed occurred in the neonatal period (<28 days old) and 21% occurred after the neonatal period (28-364 days). Deaths between the ages of 1-4 years accounted for 10 deaths (13%). Deaths from 5-17 years old account for only 25% of all deaths reviewed within this reporting year.



Age	Total
0-27 Days	41%
28-364 Days	21%
1-4 Years	13%
5-9 Years	9%
10-14 Years	4%
15-17 Years	12%
Total	**100%**

Chart 4 CWS CDOP Report 2019-2020

2.2 Age and Modifiable Factors

Deaths at 0-27 days that had at least one modifiable factor that was identified in 29% (9) of the cases examined this CSW CDOP reporting year. Most of these neonatal modifiable factors related to maternal BMI or maternal smoking.

Deaths at 28-364 days had at least one modifiable factor identified in 31% (5) of the cases. Most of these modifiable factors related to safe sleeping, consanguinity and maternal smoking.

Deaths in 1-4-year olds illustrated 20% (2) of the cases as having at least one modifiable factor identified. Modifiable factors within this category were predominantly based around safety and accident prevention.

There were no modifiable factors identified in the deaths reviewed in 5-9-year olds or 10-14-year olds.

Deaths in 15-17-year olds showed 22% (2) of the cases as having at least one modifiable factor identified. Modifiable factors within this category were predominantly based around mental health support and identification of mental health needs.

Analysis by age-group therefore, suggests two windows of opportunity to reduce child death by targeting modifiable factors: the pre-school period (in particular the first year of life) and adolescence. Modifiable factors are discussed in greater detail within the following sections.

Age	Modifiable	Non-Modifiable	Modifiable
0-27 Days	9	22	29%
28-364 Days	5	11	31%
1-4 Years	2	8	20%
5-9 Years	0	7	0%
10-14 Years	0	2	0%
15-17 Years	2	7	22%

Table 5 CWS CDOP Report 2019-2020

2.3 Gender

Of the 75 deaths reviewed, 38 were male, 37 were female and none were gender unidentifiable[2]. The proportion by gender was fairly consistent throughout the localities in which the cases were reviewed and this split is reflective of the overall population.

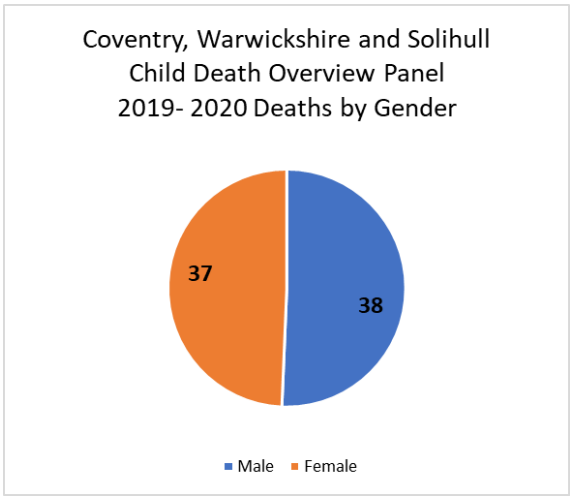
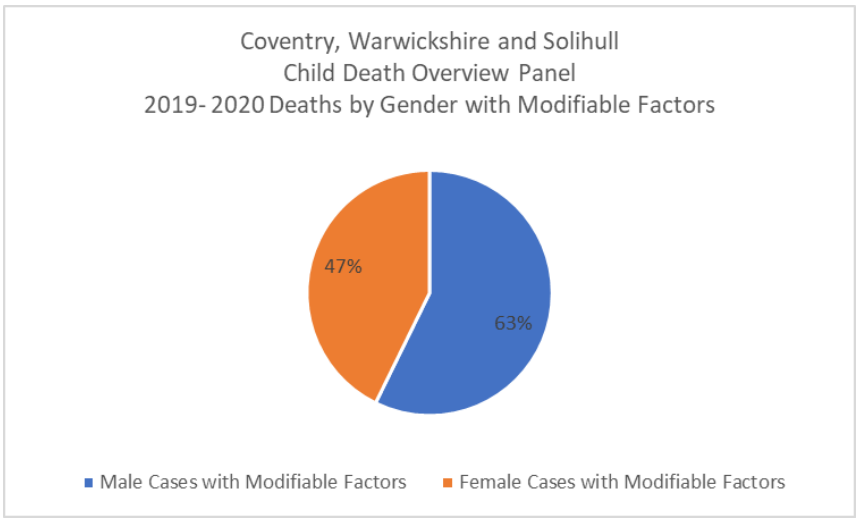


Table 6 CWS CDOP Report 2019-2020

Comparison by gender, in respect of the presence of modifiable factors, showed that there was a small variance. Males with modifiable factors identified accounted for 53% of the cases with modifiable factors and females stood at 47 %. The deaths of boys were therefore proportionately more likely than those of girls to have modifiable factors.



[2]*Three cases concerning extremely premature babies where the gender was not overtly apparent were originally reported as gender unidentifiable, these were later gender identified. Cases such as these may be reported to the national mortality database as gender 'unidentifiable'.*

2.4 Ethnicity

Most of the deaths reviewed within the panel this reporting year were from children identified as 'White - British' (61%). The second largest ethnic category of deaths reviewed within this reporting year was 'Asian or Asian British – Indian' (11%). This was shortly followed by deaths within the category of 'White - Any other White background' (8%). The other categories identified were, 'Not known/not stated' (7%), 'Black or Black British – African' (4%), 'Asian or Asian British - Any other Asian background' (3%), 'White – Irish' (3%), 'Mixed - White and Asian' (1%), 'Mixed - Any other mixed background' (1%) and 'Other ethnic group - Any other ethnic group' (1%). It is noteworthy that this CDOPs % are proportionate to the population, this contrasts to the national picture where Black or Minority Ethnicity deaths are overrepresented.

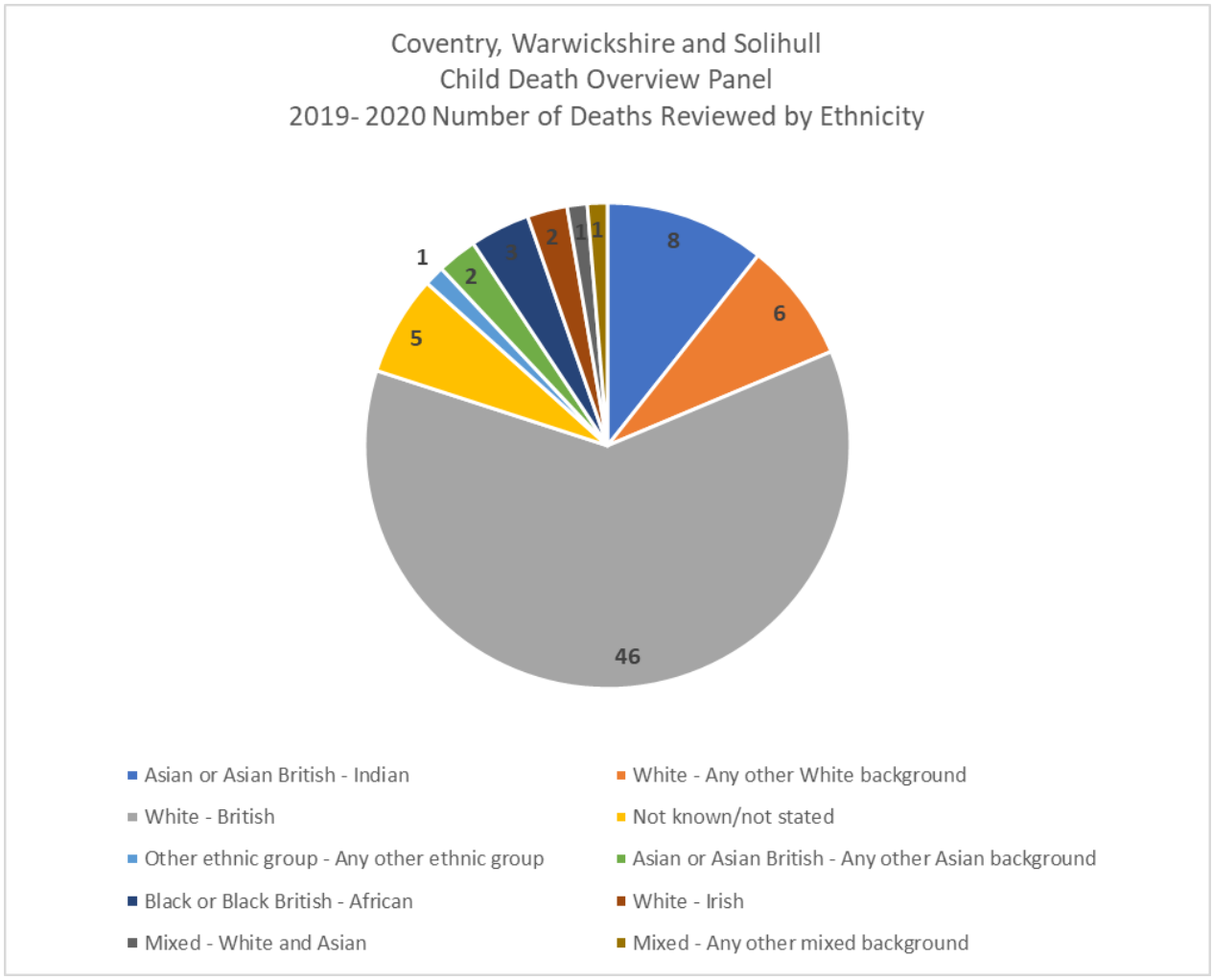


Table 8 CWS CDOP Report 2019-2020

2.5 Vulnerability Status

Across all 75 reviews completed, one child was a looked after child and on a child protection plan at the time of their death, and this child's death fell into the category of a trauma related death. Three children were categorised as children in need within the reviewed cases of this reporting year, two of the deaths were due to chromosomal chronic conditions and one was categorised as an acute medical death. These children were classified as children in need due to their ongoing disabilities None of these cases were noted to have modifiable factors. No children were reported to be under any further statutory orders either previously or at the time of death. The statutory orders that CDOP requests information about are: Police Powers of Protection, Emergency Protection Order, Interim Care Order, Care Order, Supervision Order, Residence Order, Section 20 (Children Act 1989), Antisocial behaviour order or other court order.

3. Place of Death

Place of Death	%
Hospital	**73%**
Hospital Adult Intensive Care Unit	3%
Hospital Emergency Department	3%
Neonatal Intensive Care Unit	40%
Hospital Labour	9%
Hospital	9%
Other than Hospital	**27%**
Home	20%
Public Place	3%
Not Known	1%
Hospice	3%

Table 9 CWS CDOP Report 2019-2020

3.1 Death Location

Across all 75 deaths reviewed, 73% had Acute Hospital recorded as the location at the time of the event/condition which led to the death. Of these, 49% were in a neonatal unit, paediatric intensive care unit or a paediatric ward while 24% were in another location in the hospital (including delivery suites, labour wards and transplant units).

20% of reviews recorded the home of normal residence as the place of death, with those deaths either being from a life limiting condition or sudden and unexpected. 3% of deaths were recorded in a public place including roads, railways, parks, restaurants and beaches.

The remaining 4% of total deaths occurred in either a hospice or a place unknown to this review team.

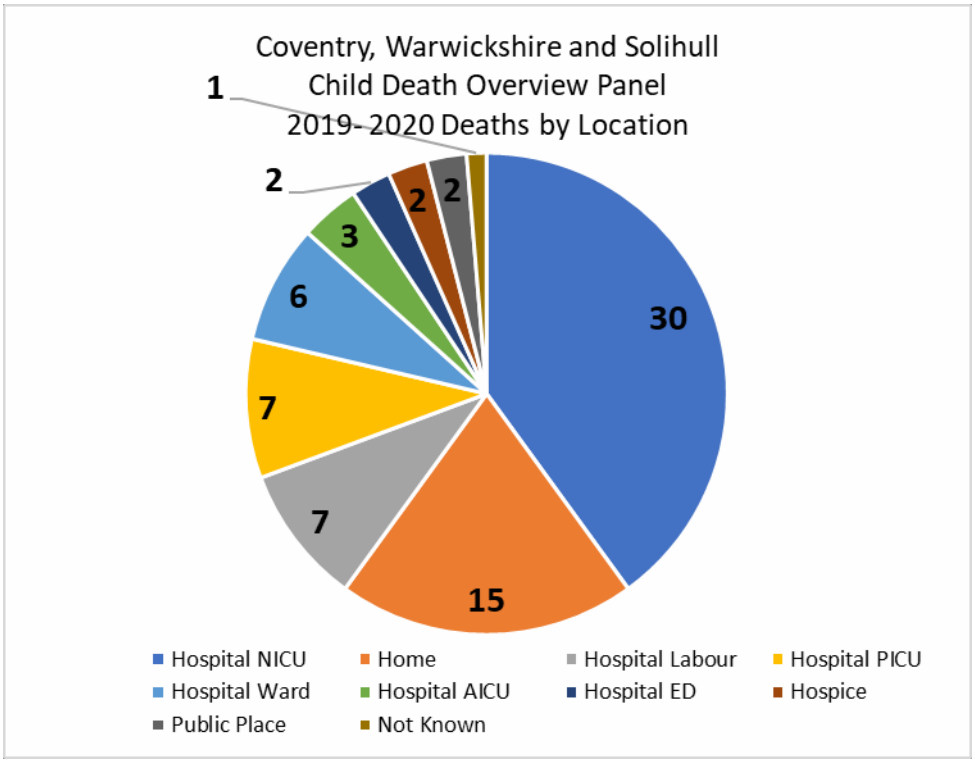
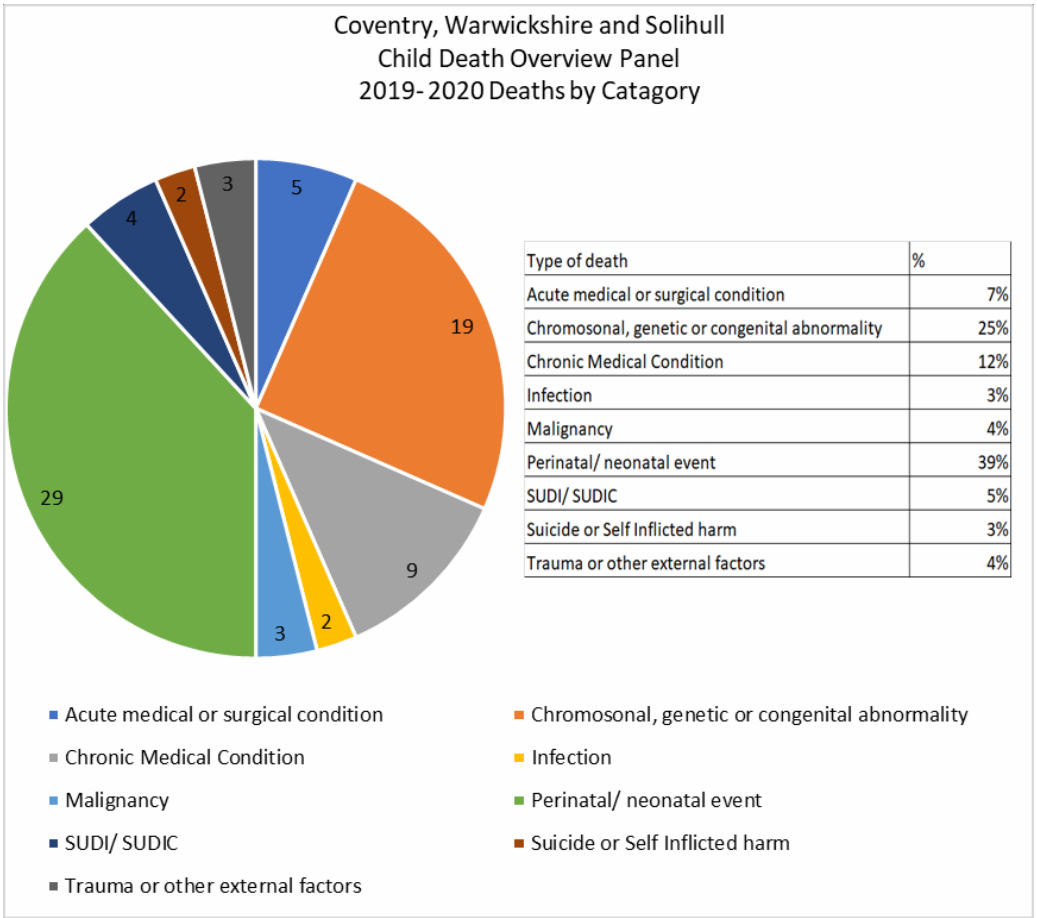


Figure 5 CWS CDOP Report 2019-2020

4. Generic themes across the sub-region

4.1. Category of death

The figure below shows the categories of death for the CDOP cases for the period 1st April 2019 to 31st of March 2020, while the text below examines the relationship between the modifiable/non-modifiable factors and the category of death. A modifiable factor is any factor that the panel determines would reduce the chances of death in the future. The basis for their decision is determined by the professional experience they offer to the panel.



Type of death	%
Acute medical or surgical condition	7%
Chromosonal, genetic or congenital abnormality	25%
Chronic Medical Condition	12%
Infection	3%
Malignancy	4%
Perinatal/ neonatal event	39%
SUDI/ SUDIC	5%
Suicide or Self Inflicted harm	3%
Trauma or other external factors	4%

Table 11 CWS CDOP Report 2019-2020

4.1.1. Perinatal/neonatal event

Across all deaths reviewed, the majority were categorised as a perinatal/neonatal event (39%). Of the 29 deaths reviewed 8 were identified to have modifiable factors (27%). The modifiable factors were smoking and maternal BMI in four of the cases. In two cases the care pathway's for pregnancy were a modifiable factor. A further modifiable factor[3] was an unwell, preterm baby receiving formula milk as opposed to donor breast due to a lack of availability of mothers own milk. This was considered modifiable on the basis of maternal milk being better for health. Finally, two further cases identified modifiable factors within the CDRM (Child Death Review Meeting) within the hospital and completed an RCA (Root Cause Analysis) to determine modifiable factors. The RCA modifiable factors related to resuscitation of a baby and the administration of steroids during labour. Firstly ensuring the correct resuscitation is applied at the correct time and secondly the recommendation for supplying steroids during pregnancy in particular risk-based situations.

4.1.2 Chromosomal, genetic and congenital anomalies

A total of 25% of deaths reviewed were categorised as chromosomal, genetic and congenital anomalies. Of the 19 deaths 4 (21%) were identified as having modifiable factors. Modifiable factors identified were two cases involving BMI and smoking during pregnancy. A further modifiable factor was regarding a piece of acquired medical equipment having an alarm that could be switched off by family members. Although, it would not have affected the outcome of this case it could in other cases. In

[3] *Modifiable factors are identified by panel members and based on their professional competencies and experience with the overarching aim of identifying learning to improve outcomes for children.*

respect of the fact that medical machinery alarms offer quicker response opportunities, to turn them off can influence the outcomes of a child's care. Thus, the machinery was considered modifiable as learning was shared regarding equipment with medical alarms. Finally, a modifiable factor within this category related to use of class A drugs and domestic violence being present within the home setting.

4.1.3. Chronic medical condition
A total of 12% of deaths reviewed were categorised as resulting from a chronic medical condition. Of the 9 deaths that were recorded within this category 2 were considered to have modifiable factors (22%). Modifiable factors identified in one case were regarding smoking during pregnancy. Within the second case a modifiable factor of antibiotic prescription was identified, this concerned the ceasing of prophylactic medication that had the potential to treat the child against the cause of death. It was identified that flagging prophylactic drugs within medical practices on patient records would add extra security to ensure their continuation. Learning about prevention of future deaths was discerned from this, thus, it is considered to be a modifiable factor.

4.1.4. Acute medical/surgical condition
A total of 7% of deaths reviewed were categorised as resulting from an acute medical/surgical condition. Of the 5 deaths that were recorded within this category 1 was considered to have modifiable factors. Modifiable factors identified were regarding the raising of awareness to do with a rare medical condition and its common symptoms in order to aid support for children who have the condition. The learning and condition has been anonymised for this report but information was shared with practitioners within this locality.

4.1.5. Sudden unexpected unexplained death
A total of 5% of deaths reviewed were categorised as resulting from a sudden unexpected unexplained death. Of the 4 deaths that were recorded within this category 2 were considered to have modifiable factors. Modifiable factors identified were related to safe sleeping and compliance to the advice given by practitioners. Many of the modifiable factors were acknowledged that parents were provided with safe sleeping advice but did not always follow it. Furthermore, both cases had modifiable factors relating to smoking within the home environment.

4.1.6. Trauma and other external factors
A total of 4% of deaths reviewed were categorised as resulting from trauma and other external factors. Of the 3 deaths that were recorded within this category 1 was considered to have modifiable factors. Modifiable factors identified were regarding assessing the placement for children who are in care and how to support and manage children who are at risk of childhood exploitation. This included a review of police interceptions with grooming and current methodology as well as reviewing how placements were selected for children at risk of exploitation when they are placed in care.

4.1.7 Suicide/Self-Inflicted Harm
A total of 4% of deaths reviewed were categorised as resulting from a suicide/self-Inflicted harm. Of the 3 deaths that were recorded within this category none were considered to have modifiable factors. Whereas mental health support is frequently identified as a modifiable factor, it was note in these particular instances. However, CDOP has utilised case learning from these review post—this reporting year.

4.1.8. Malignancy
A total of 3% of deaths reviewed were categorised as resulting from malignancy. Of the 2 deaths that were recorded within this category none were considered to have modifiable factors.

4.1.9. Infection
A total of 3% of deaths reviewed were categorised as resulting from an infection. Of the 2 deaths that were recorded within this category 1 was considered to have modifiable factors. Modifiable factors identified were regarding the sepsis protocol and further learning to refine its future development. This included the factor of being able to distinguish between sepsis and viral infection. This learning is shared through partners via acute leads.

	Modifiable factors (%)	Total number of children discussed at panel(%)
Acute medical or surgical condition	1 (20%)	5 (7%)
Chromosomal, genetic or congenital abnormality	4 (21%)	19 (25%)
Chronic Medical Condition	2 (22%)	9 (12%)
Infection	1 (50%)	2 (3%)
Malignancy	0 (0%)	3 (4%)
Perinatal/ neonatal event	8 (27%)	29 (39%)
SUDI/ SUDIC	1 (33%)	4 (4%)
Suicide or Self Inflicted harm	1 (33%)	2 (4%)
Trauma or other external factors	1 (33%)	3 (4%)

5. Additional information on deaths with modifiable factors

5.1. Deaths with modifiable factors

Nationally, the average perecentage of modifiable deaths is expected to be around 33% as per national statistics from Child Death.

Area	Modifiable	Non-Modifiable	Total	%
Coventry	3	19	22	14%
Warwickshire	14	31	45	31%
Solihull	3	5	8	37%

Table 13 CWS CDOP Report 2019-2020

◊A total of 3 deaths with modifiable factors were reviewed in Coventry during 2019/ 20. This was a total of 14% and thus, below national average for reporting modifiability.

◊3 deaths with modifiable factors were reviewed in Solihull during 2019/20. This was a total of 37% and this, slightly above national average for reporting modifiability. However, with such a low number od death reviewed within this region, is it not statistically significant.

◊14 deaths with modifiable factors were reviewed in Warwickshire during 2019/20.

5.1.1. Trauma and other external factors death

There was one 'trauma and other external factors categorised death' where modifiable factors were identified. These factors extended to the placement of the care home and management of risk of childhood exploitation. This child died from a road traffic accident, although the circumstances of the accident were considered, there were no modifiable factors identified within the accident itself. Learning was identified within this case that related to reviewing care placements in looked after children. The findings of this were also shared with the serious cases review panel.

5.1.2. Acute medical or surgical condition

There was one death resulting from an acute medical condition where modifiable factors were identified. The child died from pneumonia and had significant underlying health conditions. Consanguinity was identified within this case as an modifiable factor. Further modifiable factors related to the recognition of the symptoms of rare medical conditions and how they can affect complex patients who may not be able to describe symptoms. Learning was identified and added to from the mortality and morbidity meeting. The learning included recognising the importance of direct payments to parents for children in need as well as recognising that the home should be suitable for the condition and needs of the child at the time . Furthermore, it was identified that learning should be shared about reversable conditions being treated or attempted to be treated even when a child is on a palliative care pathway I.e. infections

5.1.3. Chronic medical condition

There were two deaths resulting from a chronic medical condition where modifiable factors were identified:

One child died as the result of a life limiting condition in the neonatal stages. Maternal smoking during pregnancy was identified as a modifiable factor although it was clearly stated that this would not have contributed to the death.

The second death was in a child who also had a life limiting condition. The condition involved the regular administration of prophylactic medication; the continuation of this was miscommunicated when a change of medication was required.

Further learning that derived from these cases was regarding the clarity of vaccination prioritisation in the cases of children at risk of illness when vaccinations are in limited supply. The learning regarding prioritisartion was shared with medical practices.

5.1.4. Chromosomal/genetic/congenital

There were four deaths resulting from a genetic condition where modifiable factors were identified:

The first child died following severe onset of a congenital condition affecting brain function and movement. Modifiable factors were identified to be smoking during pregnancy with a substantial history of domestic violence and class A drug use. Learning from this case identified that smoking cessation was not an opt out service and a lot of work has been done with guidelines to develop awareness within the community midwifery team across the CDOP locality.

The second child died from a significant genetic condition that limited the life of the child. Modifiable factors were identified to be smoking during pregnancy and a maternal BMI exceeding the recommended range for health.

The third child died from a significant genetic condition that limited the life of the child. Modifiable factors were identified to be linked to the choice of medical equipment. The equipment failed to provide an alarm, if this had not been the case it was considered there could have been a different outcome. Learning was identified surrounding the personal choice of medical care and equipment and how this can affect death review and modifiability.

The fourth child was born with a complex congenital heart defect and subsequently died of this abnormality. The defect was not diagnosed in the antenatal stage and the modifiable factor was identified as the maternal BMI being over 45. Learning from this included identifying that a lower BMI would allow for better views of the baby on the scan, however, it would still not guarantee that the condition could have been identified prior to birth. There is a further ongoing investigation into this particular case and any subsequent learning will be continued through the child death review process if it is appropriate.

5.1.5. Perinatal/neonatal event
There were seven perinatal/neonatal deaths with modifiable factors identified.

In three of the cases the children died in the neonatal period following preterm labour. There were modifiable factors identified linked to maternal smoking, domestic violence and a high maternal BMI. Learning included the identification that even if a mother is referred to smoking cessation (due to CO readings) if she identifies as a non-smoker the service will cease. Further learning related to joint hospital death reviews and the development of these new processes in compliance with Working Together 2018. Learning was also gathered as to when a stillbirth becomes a child death with the stage in labour-based deaths being considered. Furthermore, a modifiable factor was identified as a nutritional adjunct treatment was unavailable to compliment the medical management of this case.

Two cases were that of premature neonatal children who were on antenatal care pathways that were identified as not ideal for their circumstances. Panel learning assessed that even though the care pathways could have been improved in these cases, the outcome would not have changed. This learning is important as improved antenatal care pathways reduce the chance of child death in the future.

Two cases within this category involved hospitals performing root cause analysis, in both cases the children were alive for a period of less than 28 days. Both cases involved the reflection on the timely administration of resuscitation to neonates .It was concluded that whereas there was hospital-based learning regarding resuscitation would improve outcomes for future children it would not have affected the individual cases. The learning in these cases was undertaken by the hospitals conducting the reviews and was not a part of the CDOP process.

5.1.6. Infection
There was one death resulting from infection where modifiable factors were identified. The child died after a quick progression of sepsis. Modifiable factors identified that although the death followed the existing sepsis procedures there was more that could be learnt with regards to distinguishing between sepsis and non-viral infections.

5.1.7. Sudden and unexpected death
As a result of national research there are well-recognised risk factors regarding parental smoking and infant sleeping position. The national ‘Back to Sleep’ campaign that was launched in 2015 and is now embedded within our health and education networks. Safe sleep advice is a standard part of antenatal care.

There were two sudden unexpected deaths where modifiable family and environmental factors were identified. In both of these cases the children died from causes related to unsafe sleep.

One child was provided with the safe sleeping advice and this was not followed by parents resulting in an asphyxiation related death. The modifiable factors were identified to be smoking within the household and parents not following safe sleeping advice. There was no learning from this case as both elements of modifiability are only modifiable by way of parental choice. Although it should be noted that significant local authority and CCG work has been undertaken to affirm safe sleeping messages. This has included information from maternity and health visiting services alongside an assortment of parental classes and support groups. Further work has also been employed into encouraging safe sleeping in the recent year.

The second child also died within an unsafe sleeping environment and this was identified to be the modifiable factor within the case. Learning was adduced within this case and was focussed on the identification of when welfare interventions should occur.

6.0 CDOP Actions

During this CDOP reporting year there were a total of 96 actions identified. These actions were divided into categories including; recognition, advice, change, clarity requests and extraordinary actions. Below is the overview of these actions.

6.1 ***Recognition*** *of good service provision*

26 letters of recognition of good service or appreciation were sent out this year to recognise the contributions to the child death process. These included thank you letters and communications to parents who contributed to the reviews of their children. Considerable recognition was given to the ambulance service, schools and community/palliative care.

6.2 Provision of ***Advice*** *and Guidance*

10 communications and actions were issued in terms of developing and adding to the provision of advice and guidance. Of the aforementioned actions, many involved feedback on the services provided and suggestions for improvement in individual cases. These actions can be summarised as follows:

⇒ Examining how to provide effective support to couple in consanguineous relationships.
⇒ Sharing nationally acclaimed bereavement models with local health as a point of contrast and reflection
⇒ CDOP lead advice and guidance support acute provider CDRM models under the new arrangements.
⇒ Training for GP's in protected learning time about bereavement and child death support.
⇒ Scoping the gaps in local provision of hospice services.
⇒ Engaging school leaders in messages related to cycling and road safety.

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6.3 Recommended ***Change***

8 actions were undertaken regarding recommending change. The majority of these actions directly related to the protocols that are associated with bereavement, following up social care and CDRM improvements. Included within this changes were reviews of CDRM's that lead to the refinement of hospital actions and their progression. These actions can be summarised broadly as follows:

⇒ Recommendation to follow up on social care following the death of a sibling.
⇒ Recommendations to update the existing SUDIC protocol with CDOP facilitating.
⇒ Recommending bespoke alterations to CDRM reviews to include learning relation to:
  - Resuscitation of Neonates
  - Identification of sepsis

⇒ Recommending that bereavement follow-ups are conducted if update of referral is not taken.

6.4 Further ***information***

44 actions involved the process of requesting further information. These were usually requests by panel to ensure that they had a complete picture so that their analysis of the case was complete. These requests are recorded as CDOP learning as they are used to ascertain information outside of the usual domain.

The voice of the family and child

It should also be noted that CDOP sends a letter to every parent of a child who dies, informing them that their child's death will be undergoing a CDOP review. This letter offers parents the opportunity to contribute to the review but also supplies them with information on the process and provides information on how to access bereavement support.

6.5 Extraordinary Actions

There were 5 extraordinary actions for this CDOP year that highlight actions taken outside of the normal or 'ordinary' CDOP year:

1) The establishment of the new local arrangements including the theming of panels and new structures of panel membership and action reporting. This also included reforming the ways actions are now set to include a measure of success and outcomes. This new methodology has been applied during this ongoing year and actions will be presented in a measured format within the next years annual report.

2) CDOP has effectively used the CDOP executive working group to ensure the transitions between the old local arrangements and the new arrangements remain robust. This group has also been used to assure the outcomes and progression throughout the transition.

3) CDOP has successfully moved onto the ECDOP platform for assessment and case reporting as well as using it for national returns of data to the National Child Mortality Database and Public Health England. This has involved the migration of thousands of documents onto the new secure platform along with relevant training and support to all contributors of the panel.

4) The introduction of mandatory CDRM's meant there was a highly increased need for child death review change within acute settings. As this CDOP works with eight CDRM core partnerships there was the requirement to assist in supporting bespoke models of acute CDRM review within each setting. The new requirement meant that an action for the structure to be agreed in each setting was required followed by the support of CDOP facilitating training, feeding back guidance, supporting the initialisation of CDRM's in each setting and then acting as a regular reviewer of each process. This is ongoing work and will be reviewed for time compliance and quality assurance within the 20-21 annual report.

5) CDOP during the time of this report writing was following COVID-19 measures of homeworking and virtual panels. An internal process of working in response to the pandemic had allowed this CDOP to continue its functionality under the new socially-distanced recommendations. This has involved extraordinary measures to ensure panels can go online through the use of secure and web hosted forums. Furthermore, the CDOP administration team has been fully intergrated into home working to ensure the safety of colleagues.

6.6 The aims for 2020-2021 will be as follows;
⇒Review the method of measuring actions set within panels for their reflection of success and present to the executive working group for feedback and development. The method of setting measurable actions was set out within Working Together 2018.
⇒Engage with further regional working groups and panels to improve the wider impact of action and learning. Work with the West Midlands Regional CDOP network to form a larger themed panel approach for specialist cases.
⇒Ask for feedback on the quarterly review on the CDOP transition that is contained within this document for quality assurance.
⇒To develop a Coventry, Warwickshire and Solihull CDOP website to be used as a central hub for information sharing, training, learning and development .
⇒To continue to develop the CDRM processes with partners and support the implementation of ECDOP for CDRM use.
⇒To review the success of themed panels one year into the new arrangements.

Warwickshire

Child Death Overview Panel Single Region Data

There was a total of 45 Warwickshire deaths of children reviewed by the Child Death Overview Panel during this reviewing year. Of the 45 deaths reviewed 14 were considered to have modifiable factors equating to 31% of the cases reviewed. Of the 45 deaths reviewed 5 were unexpected and had a SUDIC (sudden and unexpected death in infancy or childhood) response.

Area	Modifiable		Non-Modifiable		Total
Warwickshire	14	(31%)	31	(69%)	45

Types of death

Category 3 ; Trauma and other external factors "*This includes isolated head injury, other or multiple trauma, burn injury, drowning, unintentional self-poisoning in pre-school children, anaphylaxis & other extrinsic factors. Excludes deliberately inflicted injury, abuse or neglect. (category 1)"*

There was one death reviewed within this category involving a child in care who was struck by a car. Modifiable factors were found within this death and learning shared around childhood exploitation and care home support.

Category 4; *Malignancy "Solid tumours, leukaemias & lymphomas, and malignant proliferative conditions such as histiocytosis, even if the final event leading to death was infection, haemorrhage etc."*

There were two deaths within this category, neither of which were considered to have modifiable factors.

Category 5; *Acute medical or surgical condition "For example, Kawasaki disease, acute nephritis, intestinal volvulus, diabetic ketoacidosis, acute asthma, intussusception, appendicitis; sudden unexpected deaths with epilepsy."*

There were three deaths within this category, one of which was considered to have modifiable factors by virtue of the fact that the child was a product of consanguineous relationship. There was further learning adduced regarding the importance of treating preventable conditions in children with life limiting conditions.

Category 6; *Chronic medical condition "For example, Crohn's disease, liver disease, immune deficiencies, even if the final event leading to death was infection, haemorrhage etc. Includes cerebral palsy*

with clear post-perinatal cause."

There were four deaths reviewed under this category this year, of these two were determined to have modifiable factors. Maternal smoking during pregnancy was identified as a modifiable factor although it was clearly stated that this would not have contributed to the death. Learning stated that smoking increases the risks of pre-term labour and IUGR (Intrauterine growth restriction). Learning and modifiability within the other case regarded clarity in the accidental cessation of prophylactic medication during changes in medical care.

Category 7; *Chromosomal, genetic and congenital anomalies "Trisomies, other chromosomal disorders, single gene defects, neurodegenerative disease, cystic fibrosis, and other congenital anomalies including cardiac"*

There re twelve deaths reviewed under this category this year, of these twelve deaths, four were deemed to have modifiable factors. Three of these cases had modifiable factors of high maternal BMI and smoking during pregnancy. One case highlighted the modifiable factor of taking class A drugs during pregnancy. One highlighted that personal choice of medical equipment and antenatal care was a modifiable factor. Learning from one case identified that smoking cessation was not an opt out service and a lot of work has been done with guidelines to develop awareness within the community midwifery team.

Category 8; *Perinatal/neonatal event "Death ultimately related to perinatal events, eg sequelae of prematurity, antepartum and intrapartum anoxia, bronchopulmonary dysplasia, post-haemorrhagic hydrocephalus, irrespective of age at death. It includes cerebral palsy without evidence of cause, and includes congenital or early-onset bacterial infection (onset in the first postnatal week)"*

There were twenty one deaths that were attributed to a neonatal or perinatal event, four of which were considered to have modifiable factors. The factors identified linked to maternal smoking, domestic violence and BMI. Learning included the identification that even if a mother is referred to smoking cessation (due to CO readings) if she identifies as a non-smoker the service will cease. Further learning related to joint hospital death reviews and the development of these new processes. Learning was also gathered as to when a stillbirth becomes a child death with the stage in labour-based deaths being considered. Furthermore, the issue of the mother using formula instead of donor breast milk was raised as a modifiable factor in relation to this child's condition. One case that was noted to have modifiable factors related to the care pathway for antenatal support not being ideal for the particular case.

Category 10*: Sudden, unexpected, unexplained death "Where the pathological diagnosis is either 'SIDS' or 'unascertained', at any age."*

Two deaths were categorised within this category in this reviewing year, both of which were deemed to have modifiable factors. In both of these cases the children died from causes related to unsafe sleep. One child was provided with the safe sleeping advice and this was not followed by parents resulting in an asphyxiation related death. The modifiable factors were identified to be smoking within the household and parents not following safe sleeping advice. There was no learning from this case as both elements of modifiability are only modifiable by way of parental choice.

The second child died also within an unsafe sleeping environment and this was identified to be the modifiable factor within the case. Learning was adduced within this case and was consistent with identifying areas for improvement within welfare interventions.

Coventry

Child Death Overview Panel Single Region Data

There were a total of 22 Coventry deaths of children reviewed by the Child Death Overview Panel during this reviewing year. Of the 22 deaths reviewed 3 were considered to have modifiable factors equating to 14% of the cases reviewed. Of the 22 deaths reviewed 6 of the deaths were unexpected and had a SUDIC (sudden and unexpected death in Infancy or childhood) response.

Area	Modifiable	Non-Modifiable	Total
Coventry	3 (14%)	19 (86%)	22

Types of death

Category 2; *Suicide or deliberate self-inflicted harm "This includes suffocation, shaking injury, knifing, shooting, poisoning & other means of probable or definite homicide; also deaths from war, terrorism or other mass violence; includes severe neglect leading to death."*

There were two deaths within this category this reporting year, neither of which was considered to have modifiable factors. Both deaths involved teenage boys whom died from a self-inflicted cause.

Category 3; Trauma and other external factors "This includes isolated head injury, other or multiple trauma, burn injury, drowning, unintentional self-poisoning in pre-school children, anaphylaxis & other extrinsic factors. Excludes deliberately inflicted injury, abuse or neglect. (category 1)"

There were three deaths within this category this reporting year, none of which was considered to be modifiable. All three deaths were considered to be unexpected and two of the three had a rapid response by the police and paediatric services.

Category 4; *Malignancy "Solid tumours, leukaemias & lymphomas, and malignant proliferative conditions such as histiocytosis, even if the final event leading to death was infection, haemorrhage etc."*

There was one death within this reporting year which was not considered to have modifiable factors. It involved a the reoccurrence of a childhood malignancy.

Category 5; *Acute medical or surgical condition "For example, Kawasaki disease, acute nephritis, intestinal volvulus, diabetic ketoacidosis, acute asthma, intussusception, appendicitis; sudden unexpected deaths with epilepsy."*

There were three deaths within this category this reporting year, neither of which was considered to have modifiable factors. All three deaths were in children under the age of two and involved either an acute medical or surgical condition resulting in death.

Category 6; *Chronic medical condition "For example, Crohn's disease, liver disease, immune deficiencies, even if the final event leading to death was infection, haemorrhage etc. Includes cerebral palsy with clear post-perinatal cause."*

There were two deaths within this category this reporting year, neither of which was considered to have modifiable factors. Both children had chronic medical conditions that rendered them in a compromised position that was not compatible with long life expectancies, both dying prior to reaching one year of age.

Category 7; *Chromosomal, genetic and congenital anomalies "Trisomies, other chromosomal disorders, single gene defects, neurodegenerative disease, cystic fibrosis, and other congenital anomalies including cardiac"*

There were four deaths reviewed under this category this year, of these four deaths, none were deemed to have modifiable factors.

Category 8; *Perinatal/neonatal event "Death ultimately related to perinatal events, eg sequelae of prematurity, antepartum and intrapartum anoxia, bronchopulmonary dysplasia, post-haemorrhagic hydrocephalus, irrespective of age at death. It includes cerebral palsy without evidence of cause, and includes congenital or early-onset bacterial infection (onset in the first postnatal week)"*

There were seven deaths that were attributed to neonatal causes. All of the deaths categorised within this category were less than one month old with the majority of children either been stated to be premature or extremely premature. Two of the deaths within this category were identified as having modifiable factors. One case was that of premature neonatal children who was on a care pathway that was identified as not ideal for their circumstances. Panel learning assessed that even though the care pathway could have been improved, the outcome would not have changed. One case within this category involved hospitals performing root cause analysis. The case involved the reflection on the timely administration of resuscitation to neonates, it was concluded that whereas there was hospital-based learning it would not have affected the individual cases. The learning in this case was undertaken by the hospitals conducting the reviews and was not a part of the CDOP process.

Category 9; *Infection "Any primary infection (ie, not a complication of one of the above categories), arising after the first postnatal week, or after discharge of a preterm baby. This would include septicaemia, pneumonia, meningitis, HIV infection etc."*

There was one death within this category in this reporting year of which no modifiable factors were identified. The death was unexpected and had a joint-agency rapid response.

Solihull

Child Death Overview Panel Single Region Data

There was a total of 8 Solihull deaths of children reviewed by the Child Death Overview Panel during this reviewing year. Of the 8 deaths reviewed 3 were considered to have modifiable factors equating to 37% of the cases reviewed.

Area	Modifiable	Non-Modifiable	Total
Solihull	3 (37%)	5 (63%)	8

Types of death

Category 6; *Chronic medical condition "For example, Crohn's disease, liver disease, immune deficiencies, even if the final event leading to death was infection, haemorrhage etc. Includes cerebral palsy with clear post-perinatal cause."*

There were two deaths reviewed under this category this year, of these none were determined to have modifiable factors. Both deaths were expected.

Category 7; *Chromosomal, genetic and congenital anomalies "Trisomies, other chromosomal disorders, single gene defects, neurodegenerative disease, cystic fibrosis, and other congenital anomalies including cardiac"*

There were two deaths reviewed under this category this year, of these none were determined to have modifiable factors. Both deaths were expected and occurred in children less than a month old.

Category 8; *Perinatal/neonatal event "Death ultimately related to perinatal events, eg sequelae of prematurity, antepartum and intrapartum anoxia, bronchopulmonary dysplasia, post-haemorrhagic hydrocephalus, irrespective of age at death. It includes cerebral palsy without evidence of cause, and includes congenital or early-onset bacterial infection (onset in the first postnatal week)."*

There were three deaths reviewed under this category this year, of these two were determined to have modifiable factors. All three deaths were expected and occurred in children who were less than a month of age. Modifiable factors that were identified were linked to maternal smoking, domestic violence and BMI. One case within this category involved hospitals performing root cause analysis. The case involved the reflection on the timely administration of resuscitation to neonates, it was concluded that whereas there was hospital-based learning it would not have affected the individual cases. The learning in this case was undertaken by the hospitals conducting the reviews and was not a part of the CDOP process.

Category 9; *Infection "Any primary infection (ie, not a complication of one of the above categories), arising after the first postnatal week, or after discharge of a preterm baby. This would include septicaemia, pneumonia, meningitis, HIV infection etc."*

There was one death within this category that was identified as having modifiable factors. The child died after a quick progression of sepsis. Modifiable factors identified that although the death followed the existing sepsis procedures there was more that could be learnt with regards to distinguishing between sepsis and non-viral infections. Actions involved gaining insight from other medical facilities to review their sepsis guidelines for local learning.