

# MATERNAL DEATHS FROM OBSTETRIC HAEMORRHAGE

Saving Mothers report 2020-2022:

**599 deaths (16.4%) from haemorrhage**

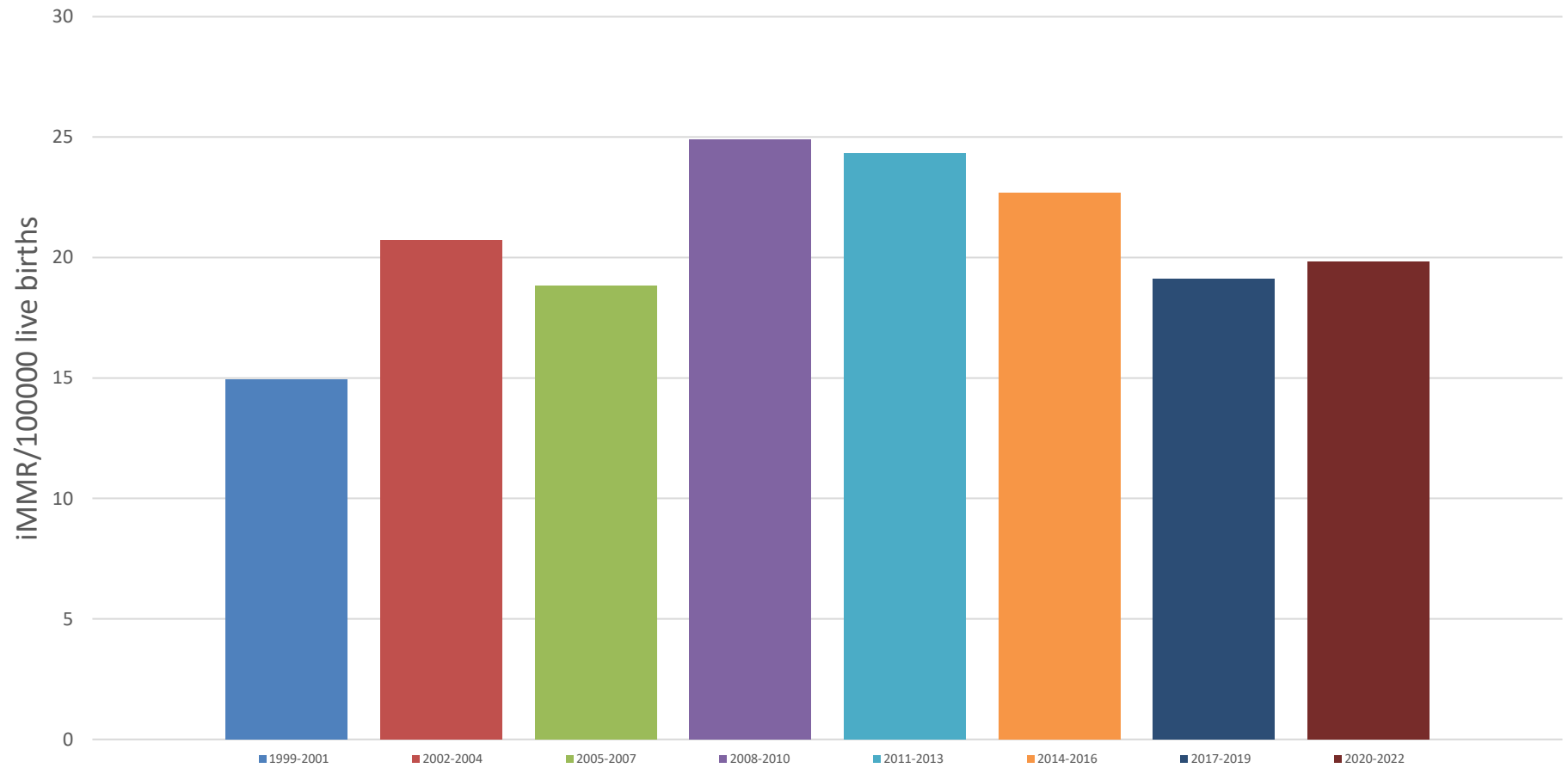
*Second most frequent cause of overall MMR*

# SA: NUMBERS, RATES, TRENDS

	Numbers	Haemorrhage iMMR (per 100,000 LBs)
2002-2004	442	19.5
2005-2007	491	18.8
2008-2010	688	24.9
2011-2013	684	24.3
2014-2016	635	23.1
2017-2019	544	19.1
2020-2022*	599	19.8

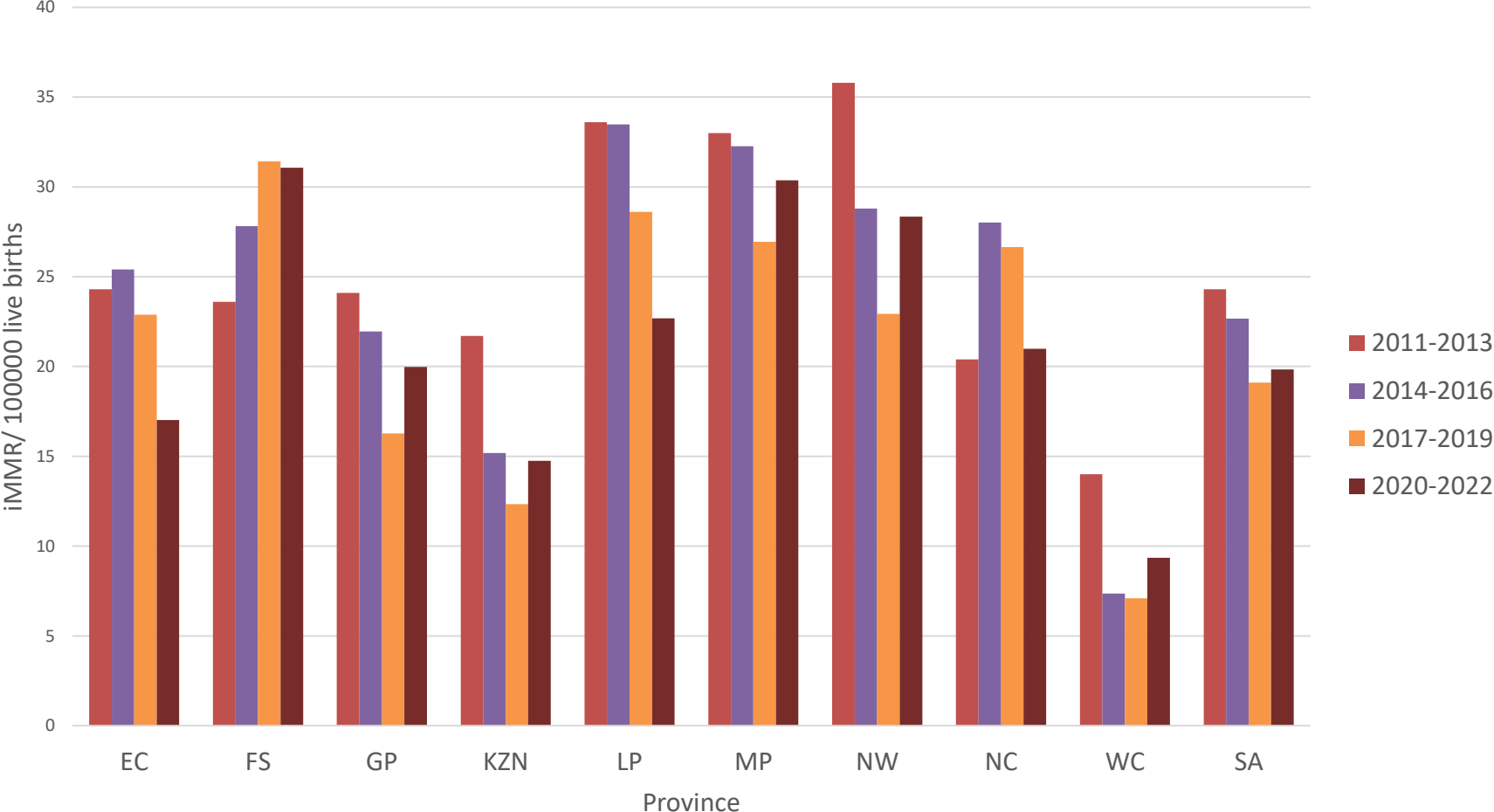
\* iMMR: 19.3 (2020); 23.3 (2021); 16.7 (2022).

# Trends in OH iMMR 1999-2022



Triennia

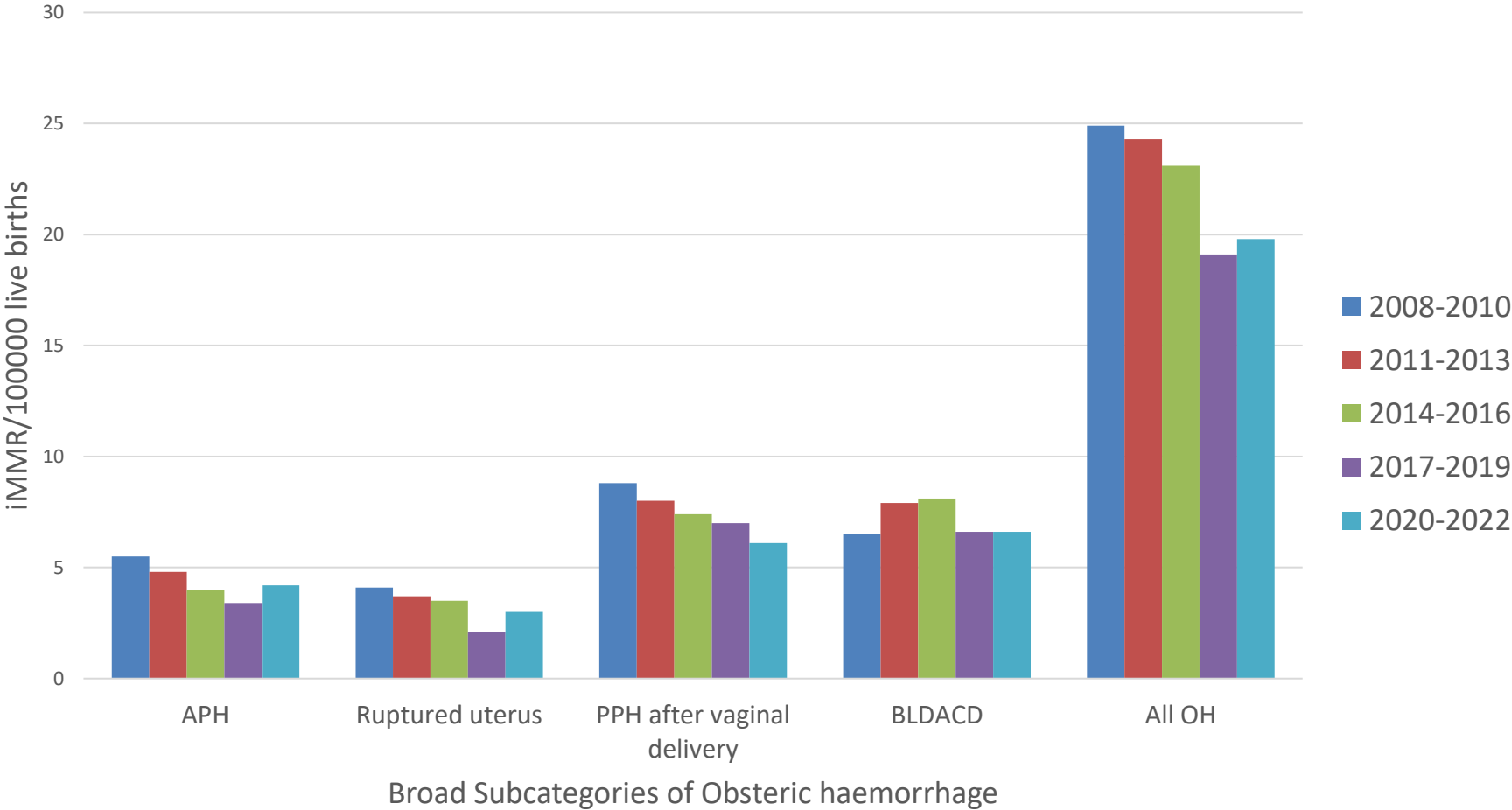
# Provincial trends in OH iMMR over four triennium



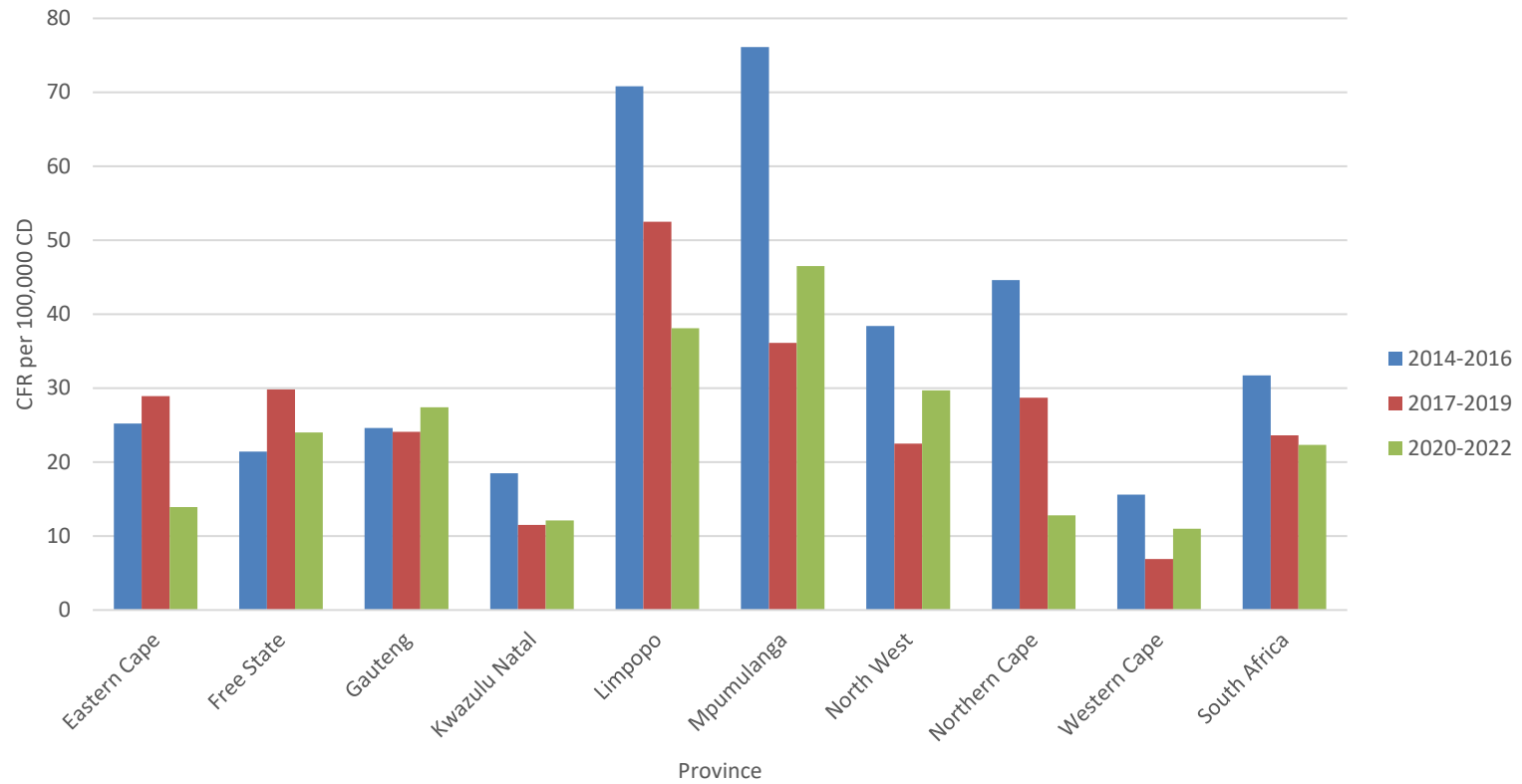
# Causes of Obstetric Haemorrhage deaths in SA

	2020-2022			2017-2019		
	N	(%)	MMR	N	(%)	MMR
<b>Bleeding at / after C section</b>	<b>198</b>	<b>(33.1)</b>	<b>6.6</b>	<b>189</b>	<b>(34.7)</b>	<b>6.6</b>
<b>PPH</b> ( <i>atony, retained placenta, trauma</i> )	<b>184</b>	<b>(30.7)</b>	<b>6.1</b>	<b>198</b>	<b>(36.4)</b>	<b>7.0</b>
<b>APH</b> ( <i>Abruptio placenta, Placenta praevia</i> )	<b>127</b>	<b>(21.2)</b>	<b>4.2</b>	<b>96</b>	<b>(17.6)</b>	<b>3.4</b>
<b>Ruptured uterus</b> ( <i>scarred and unscarred uterus</i> )	<b>90</b>	<b>(15.0)</b>	<b>3.0</b>	<b>61</b>	<b>(11.2)</b>	<b>2.1</b>
<b>TOTAL</b>	<b>599</b>	<b>(100)</b>	<b>19.8</b>	<b>544</b>	<b>(100)</b>	<b>19.1</b>

# Trends in sub-categories OH for 5 triennia (2008-2022)



# Provincial Comparison of BLDACD CFR per province 2014-2022



## LEVEL OF CARE (n=599)

<b>Level of Care</b>	<b>Number</b>	<b>%</b>	<b>MMR</b>
Home / outside	15	2.5	<i>No denominator</i>
CHC	21	3.5	5.7
District hospital	167	27.9	13.2
Regional Hospital	186	31.1	22.8
Tertiary/National central hospital	174	29	44.7
Private	36	6.0	<i>No denominator</i>



# 85.5% were Avoidable

- **Patient related – 35.4%** (*xx% delays seeking care; xx% unbooked*)
- **Administration related- 69.8%**. (*8.5% lack blood; 11.4% lack transport inst-inst ; 13.4% lack staff, 18.5% lack skill, 12.2% overburdened services*)
- **Health worker related - CHC 41%, DH-83.2% , L2- 74.4% , L3- 61% .** (*Problem recognition all levels esp CHC/DH; not referred (DH); Substandard care (all levels)*)
- **Inadequate resuscitation- xx%**

# Conclusion

- Deaths from OH and iMMR increased in 2020-2022 to become the second most common cause of MD
- The increase occurred in 2020 and 2021, probably due to the collateral effects of the Covid pandemic, but in 2022 numbers were lower than pre-pandemic.
- Wide inequities between provinces remain.
- 85.5% of OH MDs were preventable within the health system

# Key Recommendations (1)

- Protect maternity services in future pandemics.
- Implement E Motive nationally.
- Focus on preventing and treating anemia in pregnancy as well as in childhood and adolescence; addressing heavy menstrual bleeding in women, screening and treatment of chronic infections, and adequate nutrition. This requires advocacy.
- Inequities in outcomes between provinces require attention to staffing levels and clinical governance.
- No woman should be discharged from labour ward to the postnatal area if Systolic BP is  $<100$  and/or Pulse is  $\geq 110$  and/or ongoing bleeding

## Key Recommendations (2)

- Resume implementation of ESMOE/EOST training, Safe CD audit and protocol, updated PPH algorithms in view of E Motive and new SA Maternity Care guideline, use of NASG and Massive Obstetric Haemorrhage Transfusion Protocol
- Direct Telephonic / IT links for 24-hour specialist support to district hospital doctors.
- Develop training package for CHWs and WBOTs, to sensitise communities to problem of PPH.
- Work with Ambulance services to ensure appropriate prioritisation of bleeding patients and availability of urgent paramedic assisted ambulances.