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FIGO GUIDELINES

FIGO consensus guidelines on intrapartum fetal monitoring: Introduction☆☆

Diogo Ayres-de-Campos^a, Sabaratnam Arulkumaran^b,
for the FIGO Intrapartum Fetal Monitoring Expert Consensus Panel¹^a Medical School, Institute of Biomedical Engineering, S. Joao Hospital, University of Porto, Portugal^b St George's, University of London, London, UK

1. Introduction

Auscultation of the fetal heart rate (FHR) became part of routine intrapartum care in many countries during the 19th century [1], and remains an important form of fetal surveillance, particularly in low-risk pregnancies and in low-resource countries. Several technical breakthroughs that occurred in the 20th century led to the development of different forms of continuous electronic monitoring of the FHR and uterine contractions in the 1950s and early 1960s, and to the commercialization of the technology known as cardiotocography (CTG) in the late 1960s [2]. Cardiotocography (*kardia* meaning heart, *tokos* meaning labor/childbirth) is the term that best describes the continuous monitoring of the FHR and uterine contractions, but other designations such as electronic fetal monitoring are used in some countries. Fetal scalp blood sampling was introduced into clinical practice at around the same time as CTG [3], and other methods for intrapartum fetal surveillance were subsequently developed, including continuous fetal pH monitoring, fetal lactate measurement, fetal pulse oximetry, and ST waveform analysis—and some of these were successfully established. The FIGO Consensus Guidelines on Intrapartum Fetal Monitoring will focus on the clinical application of currently available methods for intrapartum fetal monitoring.

In 1985, the FIGO Subcommittee on Standards in Perinatal Medicine convened an expert consensus meeting in Switzerland to produce the “Guidelines for the use of Fetal Monitoring,” which were approved by FIGO’s Executive Board in 1986 and published in 1987 [3]. These guidelines were an important landmark in the history of FHR monitoring because they constituted the first wide-scale agreement on essential aspects of CTG monitoring, such as terminology, indications, acquisition techniques, and interpretation. Notwithstanding their decisive contribution to the field of fetal monitoring, with the passage of time, some shortcomings have become evident [4], and the document has naturally become outdated.

The present FIGO Consensus Guidelines were developed under FIGO’s Safe Motherhood and Newborn Health Committee. In February 2013, all national member societies of FIGO were contacted by email and asked to appoint one expert in this field with a wide knowledge of the fetal monitoring scientific literature, good written and spoken English, and who would be available to provide written feedback by email in less than 15 days. By May 2013, 33 experts had been nominated by national scientific societies. A literature search was then conducted to identify a further list of experts who had published major clinical research in the field. Thirteen additional experts were invited according to this criterion. A geographical representation of the members of the consensus panel is presented in Fig. 1.

The American College of Obstetricians and Gynecologists and the Royal College of Obstetricians and Gynaecologists were contacted in December 2012 for each to appoint one member of the writing committee for the cardiotocography chapter [5], and the International Confederation of Midwives was contacted in July 2013 to nominate the authors of the intermittent auscultation chapter [6].

The consensus process started in October 2013, and included three rounds for each chapter. Each round started with a draft version that was sent by email to the panel members, followed by written feedback from the panel within a time frame of three weeks. The received comments were considered by the authors and a revised manuscript was produced for the next round. After the three-round process was complete, the members of the panel were asked to read the final version and to give written consent for their name to be included in the panel list for that chapter. The consensus process for the four chapters was concluded in March 2015.

The purpose of these revised consensus guidelines is to update the existing ones, expand their scope to include all currently available

☆ Developed by the FIGO Safe Motherhood and Newborn Health Committee; coordinated by Diogo Ayres-de-Campos.

★ The views expressed in this document reflect the opinion of the individuals and not necessarily those of the institutions that they represent.

¹ Consensus panel: Daniel Surbek (Switzerland*), Gabriela Caracostea (Romania*), Yves Jacquemyn (Belgium*), Susana Santo (Portugal*), Lennart Nordström (Sweden*), Tullia Todros (Italy*), Branka Yli (Norway*), George Farmakidis (Greece*), Sandor Valent (Hungary*), Bruno Carbonne (France*), Kati Ojala (Finland*), José Luis Bartha (Spain*), Joscha Reinhard (Germany*), Anneke Kwee (Netherlands*), Ehigha Enabudoso (Nigeria*), Fadi Mirza (Lebanon*), Tak Yeung Leung (Hong Kong*), Ramon Reyles (Philippines*), Park in Yang (South Korea*), Henry Murray (Australia and New Zealand*), Yuen Tannirandom (Thailand*), Krishna Kumar (Malaysia*), Taghreed Alhaidari (Iraq*), Tomoaki Ikeda (Japan*), Ferdousi Begum (Bangladesh*), Jorge Carvajal (Chile*), José Teppa (Venezuela*), Renato Sá (Brazil*), Lawrence Devoe (USA**), Gerard Visser (Netherlands**), Richard Paul (USA**), Barry Schiffrin (USA**), Julian Parer (USA**), Philip Steer (UK**), Vincenzo Berghella (USA**), Isis Amer-Wahlin (Sweden**), Susanna Timonen (Finland**), Austin Ugwumadu (UK**), João Bernardes (Portugal**), Justo Alonso (Uruguay**), Catherine Spong (USA**), Edwin Chandrarahan (UK**).

*Nominated by FIGO associated national society; ** Invited by FIGO based on literature search.



Fig. 1. Geographical representation of the members of the FIGO consensus panel.

methods of intrapartum fetal monitoring, and to use language that is accessible to all healthcare professionals, independently of their previous expertise in the subject. The ultimate goal is to contribute to the improvement of intrapartum fetal monitoring throughout the world, thus reducing the burden of perinatal mortality and long-term sequelae, while at the same time avoiding unnecessary obstetric intervention.

Conflict of interest

The authors have no conflicts of interest.

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