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Roche's preeclampsia test helps to predict this life-threatening condition in pregnant women at risk

New data demonstrate high prognostic value of Elecsys blood test

Results of the PROGNOSIS^{1,2} study presented at the 20th World Congress on Controversies in Obstetrics, Gynecology & Infertility in Paris, demonstrate the prognostic value of the Elecsys[®] preeclampsia test from Roche to predict the absence of preeclampsia for one week and the development of preeclampsia within the subsequent four weeks. The test result enables healthcare professionals to avoid unnecessary hospitalizations by reliably ruling out preeclampsia for one week and to improve outcome for mother and child by ruling in preeclampsia allowing optimized prenatal care.

Preeclampsia is defined by hypertension associated with an increased amount of protein in the urine (proteinuria).^{3,4,5} Other clinical symptoms of preeclampsia can include severe headache, sudden swelling of face, hands and feet and pain in the upper abdomen. However, both hypertension and proteinuria are poor in predicting the clinical onset of the disease and its progression.⁶

The Elecsys preeclampsia test measures two proteins sFlt-1 (soluble fms-like tyrosine kinase-1) and PlGF (placental growth factor) in maternal blood. Depending on the test result, which is reflected as a ratio of the two proteins, physicians can reliably exclude or predict the development the disease short-term⁷, confidently focus on those women at high risk of preeclampsia.

“Results from the PROGNOSIS study mark a significant step forward in the prediction of preeclampsia,” said Prof Harald Zeisler, Department of Obstetrics and Gynecology at Medical University Vienna, Austria. “The Elecsys preeclampsia test allows physicians to predict the short term absence and manifestation of preeclampsia. Its application in clinical practice has the potential to reduce fetal and maternal morbidity and mortality as well as to avoid unnecessary hospitalizations.”

Preeclampsia occurs in approximately 1 in 20 pregnancies and is the second most common cause of maternal death.⁸ The disease can be life-threatening for mother and baby, especially if diagnosed late, and is an indication for immediate preterm delivery when acute. The majority of cases develop in healthy women bearing their first child. Medical conditions such as chronic hypertension, diabetes and renal disease are associated with an increased risk of developing preeclampsia.

“We are pleased to introduce a new and reliable approach to predicting which woman at risk will develop preeclampsia within short-term, making a true difference to the management of this serious condition”, said Roland Diggelmann, COO of Roche Diagnostics. “The new data allows us to set new standard in prenatal care, avoid unnecessary hospitalization and anxiety for the mother and her family. This is yet another testament to our commitment in women’s health.”

About the PROGNOSIS study

PROGNOSIS² is a multicenter, prospective, double-blind, non-interventional trial evaluating the short-term prediction of preeclampsia, eclampsia and HELLP (hemolysis, elevated liver enzymes, low platelet count) syndrome in pregnant women with suspected preeclampsia. Between December 2010 and January 2014, more than 1,270 pregnant women were enrolled at 30 sites in 14 countries. Presented at the 20th World Congress on Controversies in Obstetrics, Gynecology & Infertility in Paris, its primary objectives were to demonstrate that a low ratio of the proteins sFlt-1/PlGF predicts an absence of preeclampsia, eclampsia and HELLP syndrome for one week, whilst a high ratio predicts onset of preeclampsia, eclampsia and HELLP syndrome within four weeks.

About the Elecsys preeclampsia test from Roche

Since its market introduction in 2010, the Elecsys preeclampsia test has been helping healthcare professionals to identify women with preeclampsia by measuring the ratio of two proteins sFlt-1 (soluble fms-like tyrosine kinase-1) and PlGF (placental growth factor) in maternal blood; a high sFlt-1/PlGF ratio is indicative of the disease.⁷ The test is available in all countries accepting the CE mark in Europe, Latin America, Middle East, Africa and Asia. The test is currently not available in the United States and Japan.

About Roche

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personalised healthcare strategy aims at providing medicines and diagnostics that enable tangible improvements in the health, quality of life and survival of patients. Founded in 1896, Roche has been making important contributions to global health for more than a century. Twenty-four medicines developed by Roche are included in the WHO Model Lists of Essential Medicines, among them life-saving antibiotics, antimalarials and chemotherapy.

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