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## Supplementary Materials: Shallow whole-genome sequencing from plasma identifies FGFR1 amplified breast cancers and predicts overall survival

Chantal Bourrier, Jean-Yves Pierga, Laura Xuereb, Hélène Salaun, Charlotte Proudhon, Michael Speicher, Jelena Belic, Ellen Heitzer, Brian Paul Lockhart and Nolwen Guigal-Stephan

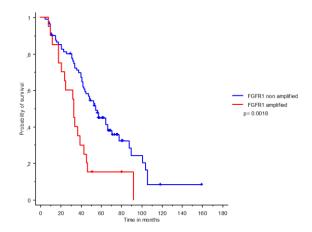


Figure S1. Overall Survival according to FGFR1 Amplification.

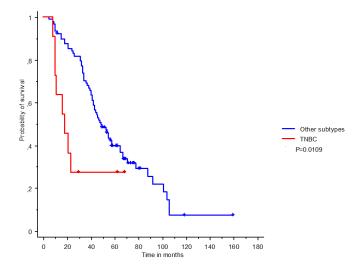
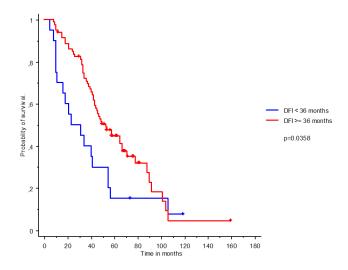
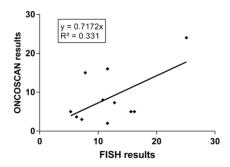


Figure S2. overall survival according to histological subtype (Log Rank).

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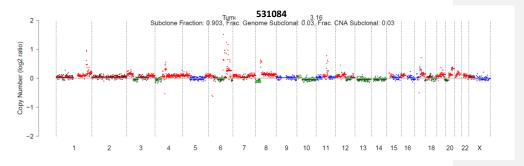
 $\textbf{Figure S3.} \ Overall \ survival \ according \ to \ Disease \ Free \ Interval \ in \ months \ (Log \ Rank).$ 

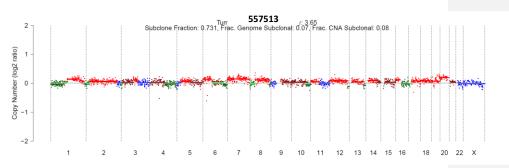


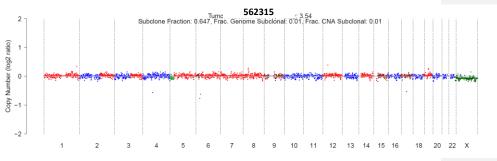
 $\textbf{Figure S4.} \ Correlation \ between \ Oncoscan \ and \ FISH \ results.$ 

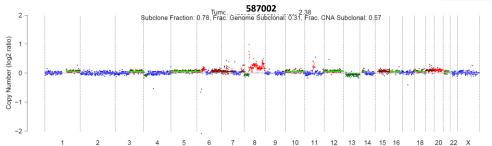
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FGFR1 amplification positive samples & detected in plasma DNA

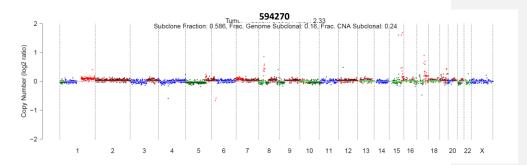


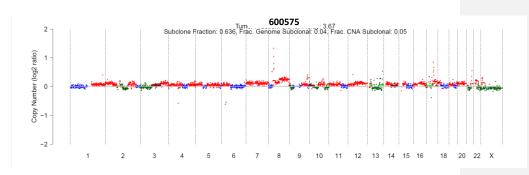


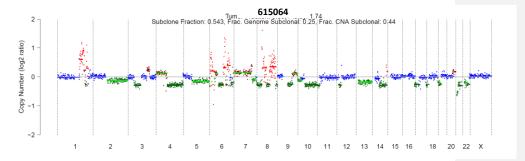


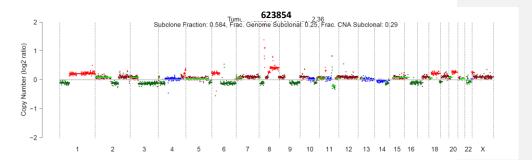


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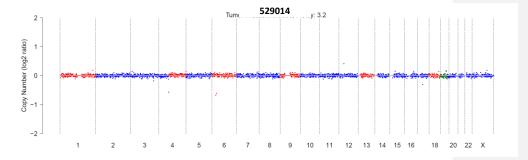


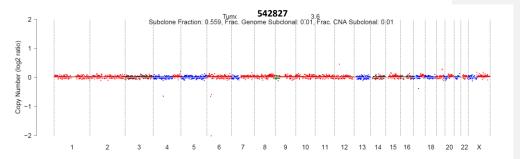




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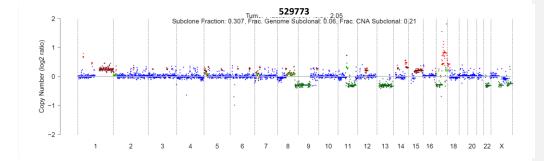
FGFR1 amplification positive samples & NOT detected in plasma DNA  $\,$ 

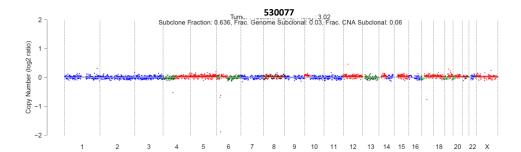


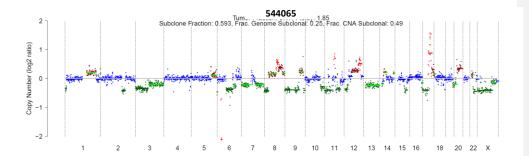


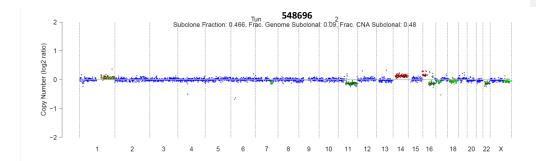
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## FGFR1 amplification negative samples

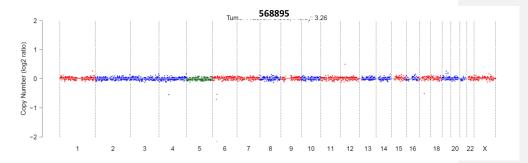


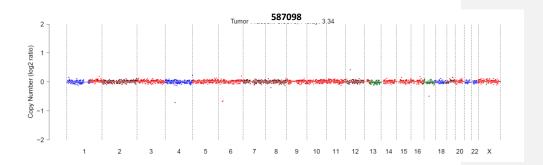


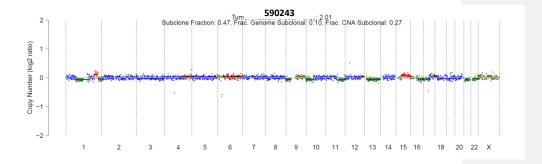


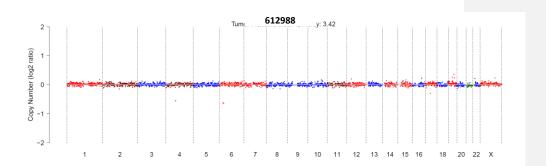


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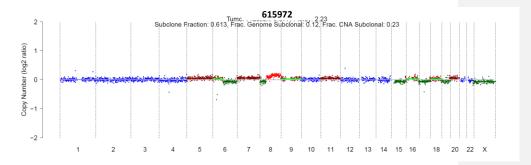








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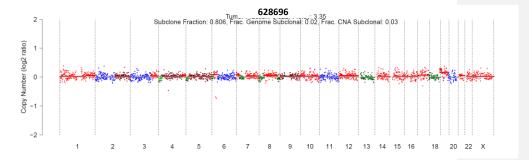
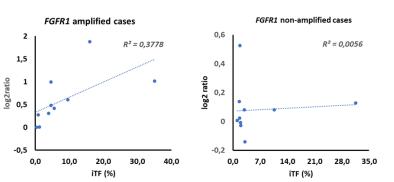


Figure S5: Detailed copy number profiles for each patient sample obtained by sWGS

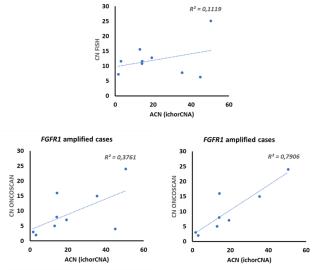


**Figure S6.** Correlation of tumour fractions FGFR1 log2ratios in plasma. Shown is a linear regression of the ichorCNA-derived tumour fraction (iTF) and respective log2ratio of a 1Mb genomic region harbouring the FGFR1 gene. Left plot, plasma DNA data from FGFR1 amplified cases. Right plot, plasma DNA data from FGFR1 non-amplified cases.

**Commented [BCI1]:** Figure 5 was previously sent in another file. We added figures in this document.

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FGFR1 amplified cases



**Figure S7.** Correlation of copy numbers from three orthogonal approaches. Shown is a linear regressions of the copy number (CN) established from FISH, ONCOSCAN and sWGS. Hypothetical absolute copy numbers (ACN) were calculated form the ichorCNA-derived tumour fraction (iTF) and respective log2ratio for FGFR1. Upper plot, Correlation of FISH and ACN from ichorCNA. Lower left plot, Correlation of ONCOSCAN and ACN from ichorCNA. Lower right plot, Correlation of ONCOSCAN and ACN from ichorCNA without one outlier.



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