

# Inspection Certificate

<b>PROVER CERTIFIER (PCERT) 1.1</b>	
<b>Manufacturer:</b>	Prover Technology AB, Krukmakargatan 21, 118 51 Stockholm, Sweden
<b>Purchase order:</b>	Order of assessment services, Prover Technology AB, Malmö, 2022-02-28.
<b>Item under Inspection:</b>	The tool PROVER CERTIFIER (PCERT) 1.1, including its documentation.
<b>Safety relevance:</b>	<p>PCERT is an offline software tool, i.e. it has no direct safety function like a control system, however, it could have influence on safety functions:</p> <p>The tool gets as input the specification (model) of a system and of its safety requirements, specified as proof obligations, in HLL (high level language). Based upon that input, a proof engine (not part of PCERT) is used by PCERT to get a correctness proof, confirming that the safety requirements are met by the system. In case of a successful proof by the proof engine, PCERT then checks the correctness of that proof by analyzing a proof log file.</p> <p>A wrong-side failure of PCERT (confirming that the proof obligations are fulfilled despite they are not fulfilled) could prevent detection of a dangerous error in the analyzed system. Due to the complexity of the system, that systematic error might not be detected by other means in the development process of the system.</p>
<b>Criteria:</b>	EN 50128:2011, Tool class T2, applications up to SIL4
<b>Objective:</b>	<p>Inspection of PROVER CERTIFIER (PCERT) 1.1 regarding to the fulfillment of the tools-related requirements of EN 50128:2011, tool class T2 for application in projects up to SIL4. Assessment results are documented in following report*:</p> <p>Inspection Report about the Tool PROVER CERTIFIER (PCERT) 1.1 according to the Requirements of EN 50128:2011, Chapter 6.7, for a Tool that is used for Verification (Tool Class T2) of Software with high Safety Criticality (up to SIL4), Report number 8120196605, Version: 1.1, 24.10.2022 by TÜV NORD Systems GmbH &amp; Co. KG</p>
<b>Result:</b>	Based on the analyses documented in the above mentioned report, the assessor confirms, that PCERT 1.1 fulfils the applicable requirements of EN 50128:2011 for tool class T2 and use for applications up to SIL4.
<b>Conditions:</b>	This certificate is related only to the class T2 evidence provided by the tool supplier. Using this as a foundation, the tool user must evaluate on its own whether the tool is appropriate for his development process and in particular for the needs of the specific application, including the safety integrity level. The tool is not generically precertified for use in the development life cycle of systems with any particular safety requirements.
<p>* This certificate of assessment is valid only in combination with the complete report mentioned above and must not be contemplated isolated.</p>	

**TÜV NORD Systems GmbH & Co. KG**

Große Bahnstraße 31, 22525 Hamburg, Germany

24 October 2022

Inspection Body SEELAB



G. Krage