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## Information technology — Lossy/ lossless coding of bi-level images

*Technologies de l'information — Codage avec ou sans perte des  
images au trait*

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This document was prepared by ITU-T as ITU-T Rec. T.88 (2018) and drafted in accordance with its editorial rules. It was adopted by Joint Technical Committee ISO/IEC JTC 1, *Information technology*, Subcommittee SC 29, *Coding of audio, picture, multimedia and hypermedia information*.

This second edition cancels and replaces the first edition (ISO/IEC 14492:2001), which has been technically revised. It also incorporates ISO/IEC 14492:2001/Amd.1:2004, ISO/IEC 14492:2001/Amd.2:2003 and ISO/IEC 14492:2001/Amd.3:2012.

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## **Information technology – Lossy/lossless coding of bi-level images**

### **Summary**

Rec. ITU-T T.88 | ISO/IEC 14492, commonly known as JBIG2, defines a coding method for bi-level images (e.g., black and white printed matter). These are images consisting of a single rectangular bit plane, with each pixel taking on one of just two possible colours. This Recommendation | International Standard has been explicitly prepared for a lossy, lossless, and lossy-to-lossless image compression.

### **History**

| Edition | Recommendation           | Approval   | Study Group | Unique ID*                                                                    |
|---------|--------------------------|------------|-------------|-------------------------------------------------------------------------------|
| 1.0     | ITU-T T.88               | 2000-02-10 | 8           | <a href="https://standards.iteh.ai/11.1002/1000/4845">11.1002/1000/4845</a>   |
| 1.1     | ITU-T T.88 (2000) Amd. 1 | 2003-06-29 | 16          | <a href="https://standards.iteh.ai/11.1002/1000/6388">11.1002/1000/6388</a>   |
| 1.2     | ITU-T T.88 (2000) Amd. 2 | 2003-06-29 | 16          | <a href="https://standards.iteh.ai/11.1002/1000/6389">11.1002/1000/6389</a>   |
| 1.3     | ITU-T T.88 (2000) Amd. 3 | 2011-05-14 | 16          | <a href="https://standards.iteh.ai/11.1002/1000/11312">11.1002/1000/11312</a> |
| 2.0     | ITU-T T.88               | 2018-08-29 | 16          | <a href="https://standards.iteh.ai/11.1002/1000/13688">11.1002/1000/13688</a> |

### **Keywords**

Bi-level images; image compression; lossy image compression; lossless image compression; lossy-to-lossless image compression; JBIG.

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## FOREWORD

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The World Telecommunication Standardization Assembly (WTSA), which meets every four years, establishes the topics for study by the ITU-T study groups which, in turn, produce Recommendations on these topics.

The approval of ITU-T Recommendations is covered by the procedure laid down in WTSA Resolution 1.

In some areas of information technology which fall within ITU-T's purview, the necessary standards are prepared on a collaborative basis with ISO and IEC.

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As of the date of approval of this Recommendation, ITU had received notice of intellectual property, protected by patents, which may be required to implement this Recommendation. However, implementers are cautioned that this may not represent the latest information and are therefore strongly urged to consult the TSB patent database at <http://www.itu.int/ITU-T/ipr/>.

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