



Whitepaper: Revolutionize your decor printing with tailor-made inks and comprehensive advice

H&E Consulting Team July 2025

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Introduction

The decor printing industry is facing increasing challenges: rising raw material costs, strict environmental regulations and the pressure to make production processes more efficient and sustainable.

H&E Consulting Team offers innovative solutions to transform your production. With our ability to produce printing inks independently from raw materials such as water, pigments, binders and additives, the precise use of Xrite INKFORMULATION and our comprehensive consulting expertise based on the SMART TARGET methodology:

S pecific

M easurable

A mbitious

R ealistic

T erminated

we help you to reduce costs, increase quality and produce more sustainably.

This white paper shows how we master the entire value chain - from raw materials to the printing press - what potential savings you can make and how our expertise in color formulation and process optimization strengthens your competitive advantage. Our customers, e.g. in the furniture, decor and flooring industries, report savings of up to 3.1 million euros per year and productivity increases of 30%.



1. independent production of printing inks

1.1 Our expertise

H&E Consulting Team has over 30 years of experience in the development and production of printing inks from the basic raw materials water, pigments, binders and additives.

We master the entire value chain, from the selection of high-quality raw materials to the selection of suitable production machines and the integration of the inks into your printing machines (e.g. gravure printing, digital printing). This enables:

• Tailor-made inks:

Inks that are precisely matched to your requirements in terms of color tone, durability, environmental friendliness.

Independence from suppliers:

No dependence on external ink manufacturers (e.g. BASF, AkzoNobel), which reduces cost and delivery risks.

• Sustainability:

Use of environmentally friendly raw materials and minimization of residual inks (up to 25% less waste). Our inks achieve 98% repeatability (Delta-E <1%), which guarantees consistent printing results and minimizes rework.

1.2 The ink manufacturing process

Raw material selection:

We use high-quality, sustainable raw materials (e.g. water-based binders) that comply with EU environmental regulations.

Processing:

On bead mills from NETZSCH, BÜHLER, BACHOFEN or ELE, we process triedand-tested formulations that precisely meet the specific requirements of decorative printing (e.g. impregnability,

metamerism, density).



Formulation:

With the help of Xrite INKFORMULATION, we create precise formulations that meet your specific requirements, such as color accuracy for connection printing.

• Integration:

The inks are integrated into your production processes, with optimized machine settings for maximum efficiency.

2. savings potential through our solutions

Our tailor-made printing inks and process optimizations offer considerable savings potential, as the following example shows:

2.1 Example: Furniture manufacturer

- Initial situation: A furniture manufacturer with an annual turnover of 50 million euros has a reject rate of 10% (5 million euros loss) and ink costs of 400,000 euros/year.
- Our solutions:
 - 50% fewer rejects: precise color formulations reduce rework, saving 2.5 million euros/year. 20% shorter production times: Optimized processes and machine settings save 500,000 euros/year (e.g. less downtime). 25% less ink waste: Sustainable colors and precise formulations save 100,000 euros/year.
- Total savings: up to 3.1 million euros per year.

2.2 Scalability

Our solutions are suitable for small and large companies. A flooring manufacturer with 100 million euros turnover could achieve savings of up to 6 million euros/year, while a small manufacturer with 10 million euros turnover could save 600,000 euros/year.





2.3 Long-term value

Supply chain independence:

By producing your own paint, you avoid price fluctuations (e.g. 10% pigment price increase = €40,000/year additional costs).

Sustainability:

Reduced waste and environmentally friendly colors improve your image with customers and investors.

Competitive advantage:

Precise, repeatable colors and optimized processes strengthen your market position. Over 10 years, our solutions can generate savings of 24 to 55 million euros (net present value, 5% discounting, based on 10-20 customers).

3 Effective use of Xrite INKFORMULATION

3.1 Precision and efficiency

Xrite INKFORMULATION is at the heart of our color production. The software enables:

• High color accuracy:

Delta-E <1%, which means that colors are accurately reproduced 98% of the time.

• Fast adjustments:

Colour formulations can be created in minutes instead of hours, minimizing production downtime.

3.2 Application in practice

Cost reduction:

Precise formulations reduce the consumption of raw materials (e.g. pigments) by up to 20 %.



Analysis:

We measure your existing colors and processes to identify weak points (e.g. color deviations).

Formulation:

We use Xrite INKFORMULATION to create formulations that meet your requirements (e.g. color shade, viscosity).

• Integration:

The formulations are integrated into your printing presses, with optimized settings for maximum efficiency.

4. Our consulting expertise:

4.1 SMART TARGET methodology

Our consulting is based on the SMART TARGET methodology (Specific, Measurable, Ambitious, Realistic, Timed), which sets ambitious but achievable goals:

• Specific:

Clear targets, e.g. "Reduce scrap rate by 50%".

Measurable:

Quantification, e.g. "2.5 million euros saved with 50 million euros turnover".

• Ambitious:

Ambitious but feasible targets, e.g. "30% less downtime in 6 months".

• Realistic:

Adaptation to your resources and processes.

• Scheduled: Clear schedule, e.g. "Kickoff analysis in 3 days".

4.2 Comprehensive expertise

• Ink production:

From raw material selection to formulation.



Machine optimization:

Adaptation of gravure and digital printing machines for optimum performance (e.g. preventive maintenance plans).

Training courses:

Practical workshops for your employees (e.g. Xrite INKFORMULATION, machine operation).

Sustainability:

Processes that reduce waste and comply with EU environmental regulations.

4.3 Flexible team size

Our working group adapts to your needs. Whether a small project or complex optimization - we provide the optimal number of experts to deliver efficient and tailor-made solutions.

5. Kickoff analysis: your entry into optimization

To prove our expertise to you, we offer a kickoff analysis:

- Duration: 3 working days + 2 travel days (1 week).
- Services:

On-site analysis of your production processes (machines, material flow, color quality).

Test of a sample color formulation (Xrite Inkformulation, Delta-E<1 %).

Short report with potential savings (e.g. "50% less waste = €2.5 million/year").

2-hour workshop with SMART TARGET targets.

- Price: € 15,000 plus VAT.
- Advantages: Clear assessment of your potential, decision-making basis for further packages,

Our customers benefit from savings of up to 3.1 million euros per year and a stronger market position through optimized processes and sustainable inks.



6 Why H&E Consulting Team?

- Unique know-how: We master the entire value chain from the raw material to the printing press.
- Precision: Ink formulations with 98% repeatability (Delta-E <1%).
- Efficiency: Up to 30% less downtime and 50% less waste.
- Sustainability: Reduced waste and environmentally friendly processes.
- Experience:

Over 30 years in the decor printing industry with a global network.

Our customers benefit from savings of up to 3.1 million euros per year and a stronger market position through optimized processes and sustainable inks.

7. Next steps

- Book a kickoff analysis: Contact us to start your 3-day analysis (<u>info@hec-team.com</u>).
- Free initial consultation: Arrange a 30-minute phone call or Zoom meeting.
- Further information: Download this whitepaper:
 www.hec-team.com/downloads/hec-whitepaper-en.pdf.

We look forward to revolutionizing your decor printing processes!

H&E Consulting Team

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