

KAFFAIR™

Upcycled Active for Hair & Scalp Care

PRODUCT NAME	PRODUCT CODES	INCI NAME	FORM
KAFFAIR™	05001-1	Coffea Arabica Seed Extract	Powder
KAFFAIR-D™	05001-2	Glycerine, Coffea Arabica Seed Extract	Liquid
KAFFAIR-B™	05002-1	Coffea Arabica Seed Extract	Powder
KAFFAIR-BD™	05002-2	Glycerine, Coffea Arabica Seed Extract	Liquid



01. PRODUCT DESCRIPTION

KAFFAIR™ is a patent-pending active scalp and hair treatment upcycled from coffee.

KAFFAIR™ induces the expression of human growth factors IGF1, VEGF, and FGF7 genes – resulting in strengthening of cuticles and follicles, and thus acts as prevention for hair loss.

Furthermore, KAFFAIR™ also cleanses hair fibres from environmental pollutants, thanks to its strong metal chelating properties.

While it has natural coffee-derived hues, it does not dye the hair.



02. BENEFITS

Scalp and Hair Benefits:

- » Strengthens follicles
- » Helps prevent hair loss
- » Antioxidants
- » Anti-pollution

Formulation Benefits:

- » Preservative booster
- » Amphiphilic

More data coming soon.

03. RECOMMENDED APPLICATION

- » Shampoos, Conditioners & Scalp Revitalisers
- » Hair masks & Treatments
- » Scalp oils & Serums

04. SPECIFICATIONS

PARAMETERS/UNITS	SPECIFICATIONS			
PRODUCT CODE	05001	05001-2	05002	05002-2
COLOUR INTENSITY (0.1% ABSORBANCE AT 610 NM)	0.35 - 0.45	0.25 - 0.55	0.35 - 0.45	0.35 - 0.45
COLOUR BY CIE LAB (L VALUE)	45 - 55	35 - 55	45 - 55	45 - 55
TINCTORIAL POWER (0.1% ABSORBANCE AT 560 NM)	0.3 - 0.5	0.2 - 0.5	0.3 - 0.5	0.3 - 0.5
TOTAL PHENOLICS CONTENT (GALLIC ACID EQUIVALENTS)	> 5000	> 4000	> 5000	> 2000
PH (1% SOLUTION IN WATER)	7-9	7-9	7-9	7-9
LOSS ON DRYING	<5%	<5%	<5%	<5%
DENSITY	0.55-0.65G/ML	1.0-1.15G/ML	0.55-0.65G/ML	0.55-0.65G/ML
TOTAL PLATE COUNT 30°C	≤10	≤10	≤10	≤10
YEASTS AND MOULDS	≤10	≤10	≤10	≤10
ESCHERICHIA COLI	ND	ND	ND	ND
STAPHYLOCOCCUS AUREUS	ND	ND	ND	ND

Solubility % (g product/g solvent):

WATER	ETHANOL	GLYCEROL
100	100	100

Active content %: TBD

EFFICACY DATA

HAIR GROWTH - IN VITRO

RESULTS

Results showed that treatment with KAFFAIR™ at 0.03% induced the expression of the VEGF gene by $184.0 \pm 27.4\%$. The IGF1 gene was not expressed in some of the replicates of the control (non-treated) condition, however, its gene expression was induced upon treatment with KAFFAIR™ at 0.3%. Moreover, treatment with KAFFAIR™ at 0.3% induced the expression of the FGF7 gene by $89.0 \pm 23.5\%$.

CONCLUSION

In conclusion, our study shows that the in vitro treatment of human follicle dermal papilla cells with KAFFAIR™ for 24 hours induces the expression of the human growth factors VEGF (by $184.0 \pm 27.4\%$) and FGF7 (by $89.0 \pm 23.5\%$) when used at 0.03% and 0.3%, respectively. Moreover, the IGF1 gene was not initially expressed in the non-treated condition, but upon treatment with KAFFAIR™ at 0.3% we detected an increase in its gene expression.

*In vivo studies ongoing throughout 2023

