

Kurt Siekmann

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# Dictionary of Surfactants

English/German and German/English

Supplement to  
Surfactants in Consumer Products  
Ed. J. Falbe



Springer-Verlag

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Ed. J. Falbe

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# **Foreword**

This dictionary has been compiled from the manuscripts of the book

Surfactants in Consumer Products  
Theory, Technology and Application  
Springer-Verlag, 1987  
ISBN 3-540-17019-7

which was edited by me. This work provides a comprehensive survey of the chemistry, technology and application of surfactants in everyday products. It also covers important industrial applications and future trends. The wealth of subject matter is reflected in this dictionary with approx. 3,200 keywords listed in English-German and German-English.

In both languages, chemical nomenclature has been based on the latest IUPAC rules. Preference has been given to the use of American-English terminology. The gender of German nouns is given in brackets.

I wish to thank Mr. KURT SIEKMANN for having undertaken the task of compiling a dictionary dedicated to the vocabulary used in this book. I would also like to thank Dr. MARIANNE REINHARDT for the initiative to produce this supplement. I am grateful to Dr. RAINER STUMPE of Springer-Verlag for his cooperation.

I am indebted to Mr. WALTER SCHNEIDER for providing a suitable word processing program and to Miss MINOO KEYNEJAD for her invaluable assistance in proof-reading the manuscripts.

Düsseldorf, April 1987

Prof. Dr. JÜRGEN FALBE  
Henkel KGaA, Düsseldorf

# Geleitwort

Dieses Wörterbuch wurde nach den Manuskripten für das von mir herausgegebene Fachbuch

Surfactants in Consumer Products  
Theory, Technology and Application  
Springer-Verlag, 1987  
ISBN 3-540-17019-7

zusammengestellt. Die Monographie gibt einen umfassenden Überblick über die Chemie, Technologie und Anwendung von Tensiden in Produkten des täglichen Bedarfs. Sie weist weiter wichtige technische Anwendungsgebiete und -trends aus. Die Breite der Thematik spiegelt sich auch im vorliegenden Wörterbuch, in dem 3.200 Wortpaare, jeweils in Englisch/Deutsch und Deutsch/Englisch, erfaßt sind, wider.

Der Nomenklatur sind in beiden Sprachen die derzeit gültigen IUPAC-Regeln zugrunde gelegt. Es wird bevorzugt die in den USA gebräuchliche Terminologie verwendet. In Klammern ist jeweils der Genus angegeben.

Herrn KURT SIEKMANN danke ich, daß er sich der Aufgabe angenommen hat, dieses speziell auf die Beiträge des Fachbuchs abgestimmte Dictionary zu erarbeiten. Für die Anregung zu dem Supplement danke ich Frau Dr. MARIANNE REINHARDT. Herrn Dr. RAINER STUMPE, Springer-Verlag, sei für die gute Kooperation gedankt.

Die Erstellung eines geeigneten Datenverarbeitungsprogramms besorgte Herr Dipl.-Math. WALTER SCHNEIDER; Frau Dipl.-Chem. MINOO KEYNEJAD leistete wertvolle Beiträge bei der Durchsicht des Manuskripts.

Düsseldorf, April 1987

Prof. Dr. JÜRGEN FALBE  
Henkel KGaA, Düsseldorf

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# **Surfactants in Consumer Products**

**Theory, Technology and Application**

**Editor: J. Falbe**

1987. 260 figures, 122 tables. XXIII, 547 pages.  
ISBN 3-540-17019-7

**Contents:** Historical Review. – Structure and Application of Surfactants. – Synthesis of Surfactants. – Interfacial and Colloidal Properties. – Performance in Detergents, Cleaning Agents and Personal Care Products. – Manufacture of Consumer Products. – Analysis of Surfactants and Surfactant Formulations. – Environmental Impact. – Biological Effects, Toxicology and Human Safety. – Economic Aspects. – Development Trends. – Definition of Important Terms. – Subject Index.

In this book, the physical-chemical principles of action of the surfactants, their production and their application in laundry detergents, dish-washing detergents and cleaning agents as well as in cosmetics and toiletries are discussed. The technological aspects of application and formulation along with those of production and manufacturing processes are illustrated. Ecological and toxicological questions are probed in depth. Finally, important economic data concerning this branch of industry as well as an attempt to provide a perspective with regard to the future of the surfactant market round out the picture.

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M. B. Hocking

## Modern Chemical Technology and Emission Control

1985. 152 figures. XVI, 460 pages.

ISBN 3-540-13466-2

**Contents:** Background and Technical Aspects of the Chemical Industry. – Air Quality and Emission Control. – Water Quality and Emission Control. – Natural and Derived Sodium and Potassium Salts. – Industrial Bases by Chemical Routes. – Electrolytic Sodium Hydroxide and Chlorine and Related Commodities. – Sulfur and Sulfuric Acid. – Phosphorus and Phosphoric Acid. – Ammonia, Nitric Acid and their Derivatives. – Aluminium and Compounds. – Ore Enrichment and Smelting of Copper. – Production of Iron and Steel. – Production of Pulp and Paper. – Fermentation Processes. – Petroleum Production and Transport. – Petroleum Refining. – Formulae and Conversion Factors. – Subject Index.

R. Schmid, S. Fukui

## Dictionary of Biotechnology

in English-Japanese-German

With a foreword by Heinz Riesenhuber

1986. XVII, 1324 pages. ISBN 3-540-15566-X

**Contents:** Technical Terms English-German-Japanese. – List of Synonyms. – Technical Terms Japanese-English-German. – Dougigo. – Technical Terms German-English. – Synonymenliste. – Appendix.

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English/German

abrasive	Abrasiv (n)
abrasive cleaner	Scheuermittel (n)
absolute temperature	Temperatur, absolute
absorbent	saugfähig
accompanying substance	Begleitsubstanz (f)
accumulation	Akkumulation (f)
acetal	Anreicherung (f)
acetic acid	Acetal (n)
aceto glyceride	Essigsäure (f)
acid form	Acetoglycerid (n)
acid stability	Säureform (f)
acid stable	Säurebeständigkeit (f)
acid value	säurebeständig
acidity	Säurezahl (f)
acrolein	Acidität (f)
acrylic acid	Acrolein (n)
acrylonitrile	Acrylsäure (f)
activated sludge	Acrylnitril (n)
activated sludge plant	Belebtschlamm (m)
activation	Belebtschlammanlage (f)
activator	Aktivierung (f)
active chlorine	Aktivator (m)
active ingredient	Aktivchlor (n)
active oxygen	Wirkstoff (m)
active oxygen bleach	Aktivsauerstoff (m)
active oxygen content	Sauerstoffbleiche (f)
active oxygen determination	Aktivsauerstoff-Gehalt(m)
active substance	Aktivsauerstoff-Bestimmung (f)
active substance content	Aktivsubstanz (f)
active substance powder	Aktivsubstanzgehalt (m)
acute	Wirkstoffpulver (n)
acyl amide	akut
acyl amino alkane sulfonate	Acylamid (n)
acyl methyl tauride	Acylaminoalkansulfonat(n)
acyl oxyalkane sulfonate	Acylmethyltaurid (n)
acyl tauride	Acyloxyalkansulfonat(n)
acylating agent	Acyltaurid (n)
adaptability	Acylierungsmittel (n)
additional benefit	Adaptionsvermögen (n)
	Zusatznutzen (m)

additional property	Zusatzeigenschaft (f)
additive	Zusatz (m)
adenosine triphosphate	Adenosintriphosphat (n)
adhering soil	Haftschmutz (m)
adhesion	Haftung (f)
adhesive	Klebstoff (m)
adjust,to	programmieren
Adkins catalyst	Adkins-Katalysator (m)
adsorbability	Saugfähigkeit (f)
adsorbent	Adsorbens (n)
adsorption	Adsorption (f)
adsorption ability	Adsorptionsvermögen (n)
adsorption agent	Adsorptionsmittel (n)
adsorption behavior	Adsorptionsverhalten (n)
adsorption characteristics	Adsorptionskomplex (m)
adsorption complex	Adsorptionsgleichgewicht (n)
adsorption equilibrium	Adsorptionsisotherme (f)
adsorption isotherm	Adsorptionsschicht (f)
adsorption layer	Adsorptionsvorgang (m)
adsorption process	Adstringenz (n)
adstringent	Werbung (f)
advertising	Belüftung (f)
aeration	aerob
aerobic	Aerosol (n)
aerosol	Aerosoldose (f)
aerosol can	Aerosol-Schaumreiniger (m)
aerosol foam cleaner	Affinität (f)
affinity	Affinitätsunterschied (m)
affinity difference	Nachbehandlungsmittel (n)
after-treatment aid	Wäschenachbehandlung (f)
after-wash treatment	Alterung (f)
ageing	Agglomeration (f)
agglomeration	aggregieren
aggregate,to	Aggregationsvorgang (m)
aggregation process	Alterung (f)
aging	Rührorgan (n)
agitator	Rührwerk (n)
agitator-type washing machine	Rührflügelwaschmaschine (f)
agriculture	Landwirtschaft (f)

aid	Hilfsmittel (n)
air bubble	Luftblase (f)
air chamber	Windkessel (m)
air entrainment additive	Luftporenbildner (m)
air entrance zone	Lufteintrittszone (f)
air flow pattern	Luftführung (f)
air humidity	Luftfeuchtigkeit (f)
air inclusion	Lufteinschluss (m)
air-porous concrete	Luftporenbeton (m)
airlift	Airlift (m)
alcohol ethoxylate	Alkoholethoxylat (n)
alcoholate	Alkoholat (n)
Alfa-Laval-Contripure process	Alfa-Laval-Contripure-Verfahren (n)
Alfen process	Alfen-Prozess (m)
Alfol process	Alfol-Prozess (m)
alga	Alge (f)
algal growth	Algenwachstum (n)
alignment	Ausrichtung (f)
alkali	Alkali (n)
alkali flooding	Alkalifluten (n)
alkali resistant	alkalibeständig
alkali salt	Alkalisalz (n)
alkali stability	Alkalistabilität (f)
alkali stable	alkalibeständig
alkaline	alkalisch
alkaline-earth ion	Erdalkali-Ion (n)
alkalinity	Alkalität (f)
alkane	Alkan (n)
alkane sulfochloride	Alkansulfochlorid (n)
alkane sulfonate	Alkansulfonat (n)
alkane sulfonic acid	Alkansulfosäure (f)
alkanol amide	Alkanolamid (n)
alkanol amine	Alkanolamin (n)
alkanol ammonium alkyl sulfate	Alkanolammoniumalkylsulfat (n)
alkene sulfonate	Alkensulfonat (n)
alkene sulfonic acid	Alkensulfosäure (f)
alkenyl sulfate	Alkenylsulfat (n)
alkoxylation	Alkoxylierung (f)
alkyl amide ether sulfate	Alkylamidethersulfat (n)
alkyl amido betaine	Alkylamidobetain (n)

alkyl amine	Alkylamin (n)
alkyl aryl sulfonate	Alkylarylsulfonat (n)
alkyl betaine	Alkylbetain (n)
alkyl branching	Alkylverzweigung (f)
alkyl chain length	Alkylkettenlänge (f)
alkyl chloride	Alkylchlorid (n)
alkyl cyclohexane	Alkylcyclohexan (n)
alkyl dimethyl amine	Alkyldimethylamin (n)
alkyl dperoxy succinic acid	Alkyldperoxybernsteinsäure (f)
alkyl ether	Alkylether (m)
alkyl ether phosphate	Alkyletherphosphat (n)
alkyl ether sulfate	Alkylethersulfat (n)
alkyl ethoxylate	Alkylethoxylat (n)
alkyl glycoside	Alkylglykosid (n)
alkyl methyl sulfoxide	Alkylmethylsulfoxid (n)
alkyl persulfonic acid	Alkylpersulfonsäure (f)
alkyl persulfonyl radical	Alkylpersulfonylradikal (n)
alkyl phosphate	Alkylphosphat (n)
alkyl polyamine	Alkylpolyamin (n)
alkyl polyglycol ether sulfate	Alkylpolyglykolethersulfat (n)
alkyl side chain	Alkylseitenkette (f)
alkyl substituent	Alkylsubstituent (m)
alkyl sulfate	Alkylsulfat (n)
alkyl sulfonyl radical	Alkylsulfonylradikal (n)
alkylating agent	Alkylierungsmittel (n)
alkylation	Alkylierung (f)
alkylbenzene sulfonate	Alkylbenzolsulfonat (n)
alkylene oxide	Alkylenoxid (n)
alkylnaphthalene sulfonate	Alkynaphthalinsulfonat (n)
alkylphenol	Alkylphenol (n)
alkylphenol ether sulfate	Alkylphenothersulfat (n)
alkylphenol ethoxylate	Alkylphenoletroxylat (n)
alkylphenol polyglycol ether	Alkylphenolpolyglykolether (m)
all-purpose cleaner	Allzweckreiniger (m)
all-purpose detergent	Universalwaschmittel (n)
all-purpose liquid detergent	Universalfüssigwaschmittel (n)
all-purpose powder detergent	Universalpulverwaschmittel (n)
allergen	Allergen (n)
allergic	allergisch
allergy	Allergie (f)

Allied reactor	Allied-Reaktor (m)
amide	Amid (n)
amide bridge	Amidbrücke (f)
amide soap	Amidseife (f)
amidoalkyl betaine	Amidoalkylbetain (n)
amidosulfonic acid	Amidosulfonsäure (f)
amine hydrogen atom	Aminwasserstoffatom (n)
amine oxide	Aminoxid (n)
amino amide	Aminoamid (n)
amino bridge	Aminbrücke (f)
amino ester	Aminoester (m)
amino polycarboxylic acid	Aminopolycarbonsäure (f)
amino propionate	Aminopropionat (n)
aminoalcohol	Aminoalkohol (m)
aminoethyl ethanolamine	Aminoethylethanamin (n)
aminotri(methylenephosphonic acid)	Aminotri(methylenephosphonsäure)(f)
ammonium lauryl sulfate	Ammoniumlaurylsulfat (n)
ammonium salt	Ammoniumsalz (n)
amorphous silica	Kieselgel (n)
amphiphilic	amphiphil
amphoteric	amphoteric
amphoteric surfactant	Amphotensid (m)
amplitude	Amplitude (f)
amylase	Amylase (f)
amyloglucosidase	Amyloglucosidase (f)
anaerobic	anaerob
anaesthetic	anästhesierend
analysis	Analyse (f)
analysis of surfactants	Tensidanalytik (f)
anchor type agitator	Ankerrührwerk (n)
animal test	Tierversuch (m)
anion	Anion (n)
anion exchange column	Anionenaustauschersäule (f)
anion exchanger	Anionenaustauscher (m)
anion/cation surfactant	Anion-Kation-Tensid (n)
anionic	anionisch
anisotropic	anisotrop
annular slot	Ringspalt (m)
anode	Anode (f)

antagonism	Antagonismus (m)
anti-caking agent	Anticakingmittel (n)
anti-chlorination agent	Antichlorierungsmittel (n)
anti-dandruff shampoo	Antischuppenshampoo (n)
anti-graying agent	Vergrauungsinhibitor (m)
anti-irritant	Antiirritant (n)
anticorrosion agent	Korrosionsschutzmittel (n)
anticorrosion property	Rostschutzeigenschaft (f)
antifoam additive	Antischaumzusatz (m)
antifoaming agent	Antischaummittel (n)
	Schaumzerstörer (m)
antimicrobial	antimikrobiell
antioxidant	Antioxidans (n)
antiredeposition agent	Vergrauungsinhibitor (m)
antistatic	antistatisch
antistatic agent	Antistatikum (n)
apocrine	apokrin
application	Anwendung (f)
	Applikation (f)
application area	Einsatzgebiet (n)
application property	Eigenschaft, anwendungstechnische, Gebrauchseigenschaft (f)
	aprotisch
aprotic	Wassertoxizität (f)
aquatic toxicity	Wassertoxizitätsprüfung (f)
aquatic toxicity testing	wässrig
aqueous	Armour-Texaco-Prozess(m)
Armour-Texaco process	Riechstoff (m)
aroma	aromatisch
aromatic	Anordnung (f)
arrangement	künstlich
artificial	Kunstharz (n)
artificial resin	Arylsulfonat (n)
aryl sulfonate	Assoziationskolloid (n)
association colloid	unsymmetrisch
asymmetric	Asymmetrie (f)
asymmetry	Zerstäubung (f)
atomization	Attraktion (f)
attraction	Anziehungskraft (f)
attraction force	Anziehungsenergie (f)
attractive energy	

auto-analyzer	Autoanalyzer (m)
autoclave splitting	Autoklaven-Spaltung (f)
autodecomposition	Selbstzersetzung (f)
automation	Automatisierung (f)
autoradiographic	autoradiographisch
autoxidation	Autoxidation (f)
auxiliary	Hilfsmittel (n)
auxiliary agent	Hilfsstoff (m)
auxiliary substance	auxochrom
auxochromic	Verfügbarkeit (f)
availability	verfügbar
available	Flugbenzin (n)
aviation fuel	Axialgeschwindigkeit (f)
axial speed	
baby preparation	Babypräparat (n)
baby shampoo	Baby-Shampoo (n)
back-mixing	Kinder-Shampoo(n)
bacterial culture	Rückvermischung (f)
bacterial growth	Bakterienkultur (f)
bacterial strain	Bakterienwachstum (n)
bacteriostat	Bakterienstamm (m)
bacterium	Bakteriostatikum (n)
bag filter	Bakterium (n)
baking good	Schlauchfilter (m)
Ballestra Cascade system	Backware (f)
bar soap	Ballestra-Kaskadensystem (n)
basic neat soap	Stückseife (f)
basic property	Grundseife (f)
basic soap	Basiseigenschaft (f)
batch process	Grundseife (f)
batch washing machine	Chargenverfahren (n)
bath cleaner	Waschstrasse (f)
bath oil	Badreiniger (m)
bath preparation	Badeöl (n)
bath salt	Badepräparat (n)
bath soap	Badesalz (n)
bathtub	Körperseife (f)
beautification	Badewanne (f)
	Verschönerung (f)

beautifying	Verschönerung (f)
beauty aid	Schönheitsmittel (n)
bed linens	Bettwäsche (f)
beechwood ash	Buchenholzasche (f)
beef tallow	Rindertalg (m)
beet sugar	Rübzucker (m)
behenate	Behenat (n)
behenic acid	Behensäure (f)
bentonite	Bentonit (m)
benzimidazole	Benzimidazol (n)
benzoic acid	Benzoesäure (f)
benzoxazole	Benzoxazol (n)
betalactoglobulin	Betalactoglobulin (n)
bile	Galle (f)
bile acid	Gallensäure (f)
binary	binär
binder	Bindemittel (n)
binding site	Bindungsstelle (f)
biochemical oxygen demand	Sauerstoffbedarf, biochemischer
biodegradability	Abbaubarkeit, biologische
degradability data	Abbaubarkeitsdaten
biodegradable	abbaubar, biologisch
biological	biologisch
biological degradation	Abbau, biologischer
biological sewage purification	Abwasserreinigung, biologische
biosurfactant	Biotensid (n)
biotic	biotisch
biotransformation	Biotransformation (f)
birefringence	Doppelbrechung (f)
bismuth active	bismutaktiv
bitumen emulsifier	Bitumenemulgator (m)
bitumen emulsion	Bitumenemulsion (f)
bleach activator	Bleichaktivator (m)
bleach bath	Bleichbad (n)
bleach process	Bleichprozess (m)
bleachability	Bleichbarkeit (f)
bleachable	bleichbar
bleaching agent	Bleichmittel (n)
bleaching agent content	Bleichmittelgehalt (m)
bleaching effect	Bleicheffekt (m)

bleaching effect	Bleichwirkung (f)
bleaching mechanism	Bleichmechanismus (m)
bleaching reaction	Bleichreaktion (f)
bleaching system	Bleichsystem (n)
bleed,to	ausbluten
blended product	Mischprodukt (n)
blending	Aufmischung (f)
blepharospasm	Blepharospasmus (m)
block arrangement	Blockanordnung (f)
block copolymerisate	Block-Copolymerat (n)
block polymer	Blockpolymere (n)
blocking	Blockierung (f)
blouse	Bluse (f)
blue rinsing aid	Blauspüler (m)
body	Körper (m)
body care	Körperpflege (f)
body cleaning	Körperreinigung (f)
body cleaning agent	Körperreinigungsmittel (n)
body lotion	Körperlotion (f)
body odor	Körpergeruch (m)
body secretion	Körperausscheidung (f)
body soap	Körperseife (f)
body tissue	Körpergewebe (n)
boiling limit	Siedende (n)
boiling point	Siedepunkt (m)
boiling point difference	Siedepunktsdifferenz (f)
boiling temperature	Kochtemperatur (f)
boiling wash process	Kochwaschprozess (m)
bonding capacity	Bindevermögen (n)
bonding mechanism	Bindungsmechanismus (m)
booster	Schwerpunktverstärker (m)
boric acid	Borsäure (f)
Bouveault-Blanc process	Bouveault-Blanc-Verfahren (n)
bovine serum albumin	Rinderserumalbumin (n)
bowl block	Beckenstein (m)
branched	verzweigt
branched chain	verzweigtkettig
branching	Verzweigung (f)
brand name	Warenzeichen (n)
break point	Knickpunkt (m)