







### MIKROPLAST- RESTRIKSJONER OGSÅ FOR BIOBASERTE POLYMERE?

Miljøforum - 12. September 2019 Pål Christian Evensen Corporate Regulatory Affairs Manager



# Borregaard 2018

#### Antall ansatte



1100

760 i Norge

### **Produksjon**



Lignin

Spesialcellulose

Bioetanol

Vanillin

Cellulosefibriller

Finkjemikalier

### Råmateriale



fm3 norsk gran 500.000 tonn ligninråvare

### Borregaard i verden





Virksomhet i

16

land

Salg til

110

land

Salg utenfor Norge

95

prosent

Omsetning

ulike produkter

4,8

milliarder kr

Økonomi



Resultat

580

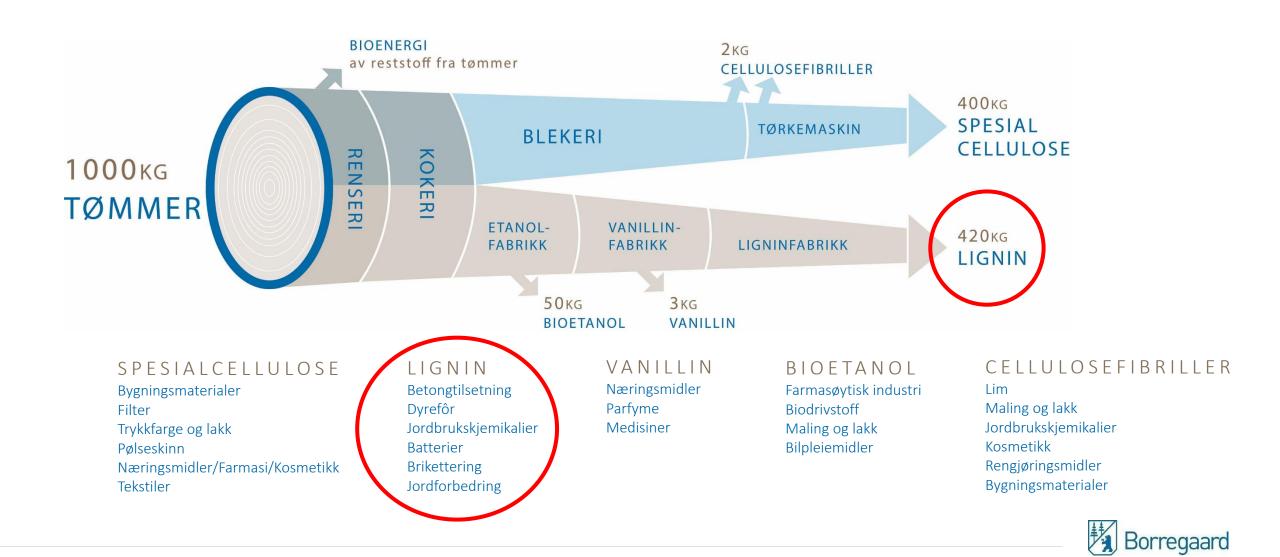
millioner kr

Investeringer

762

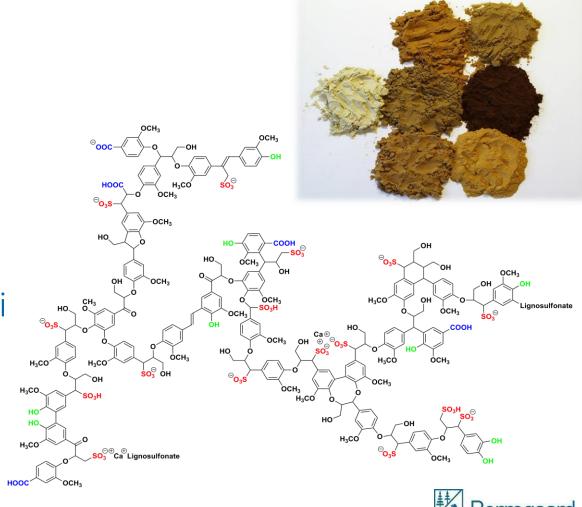
millioner kr

## Verdiskaping gjennom høy råvareutnyttelse og markedsinnsikt



## Lignosulfonater

- Kjemisk modifiserte naturlig polymere
- Flytende- eller pulverprodukter
- Vannløselige
- Ikke helse- eller miljøskadelige
- Brukt som dispergeringsmidler, bindemidler og komplekseringsmidler i vannbaserte formuleringer



# Er lignosulfonater "intentionally added microplastics"?

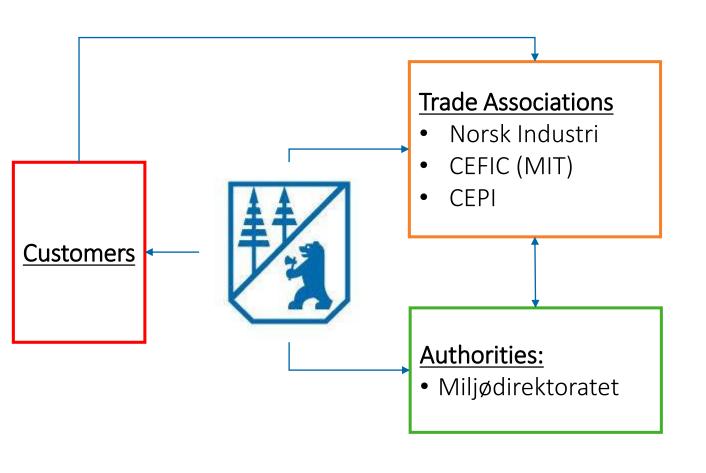
- Kjemisk modifisert naturlig polymer
  - Ikke dekket av unntaket (#3a)
- Partikkelstørrelse innenfor definisjonsområdet
  - $\geq 1\%$  w/w av partiklene har dimensjon  $1 \text{nm} \leq x \leq 5 \text{mm}$
- Nedbrytbarhet
  - Brytes ned, men langsomt
- Vannløselig
  - Løselighet ikke en del av den regulatoriske definisjonen

Commission request (2017)

"Prepare an Annex XV"
dossier in view of a possible restriction of synthetic water-insoluble polymers"



# Hvordan jobber vi?



## Åpen høring, hovedpunkter:

- For bred definisjon;
- Løselighet
- Nedbrytbarhet

- Regulatorisk
- Risikobegrepet hazard (?)
- Rapportering (kost/nytte)



# Vårt budskap

As plastic-replacing materials are being developed from biobased polymers, these may not pass the OECD biodegradability criteria while still being a giant leap towards sustainable and renewable materials, i.e. tackling the same concern as of the proposed restriction.

This development should not be obstructed by an unclear restriction, especially when taking bearings from one of the aims of the REACH Regulation, enhancing competitiveness and innovation.

Eller sagt på en annen måte; lignosulfonater bør være en del av løsningen, ikke problemet



# Vedlegg



## Proposal for a Restriction – 20 March 2019



## ANNEX XV RESTRICTION REPORT PROPOSAL FOR A RESTRICTION

SUBSTANCE NAME(S): intentionally added microplastics IUPAC NAME(S): n/a

EC NUMBER(S): n/a
CAS NUMBER(S): n/a

CONTACT DETAILS OF THE DOSSIER SUBMITTER:

European Chemicals Agency (ECHA)

Annankatu 18, PO BOX 400, FI-00121, Helsinki, Finland

VERSION NUMBER: 1.1 DATE: 20 March 2019

## Scope

 Restricting the use of intentionally added microplastic particles in consumer or professional use products of any kind

## Public hearing

- 1st deadline for comments on restriction report
  - 20/05/2019
- Final deadline for comments on restriction report
  - 20/09/2019



## Proposed restriction - definitions

### Polymers within the meaning of Article 3(5) of Regulation (EC) No 1907/2006 (REACH)

- 1. Shall not, from [EiF], be placed on the market as a substance on its own or in a mixture as a microplastic in a concentration equal to or greater than [0.01]% w/w.
- 2. For the purposes of this entry:
  - **a.** 'microplastic' means a material consisting of solid polymer-containing particles, to which additives or other substances may have been added, and where  $\geq 1\%$  w/w of particles have (i) all dimensions  $1 \text{nm} \leq x \leq 5 \text{mm}$ , or (ii), for fibres, a length of  $3 \text{nm} \leq x \leq 15 \text{mm}$  and length to diameter ratio of >3.
  - b. 'microbead' means a microplastic used in a mixture as an abrasive i.e. to exfoliate, polish or clean.
  - **c.** 'particle' is a minute piece of matter with defined physical boundaries; a defined physical boundary is an interface.
  - d. 'polymer-containing particle' means either (i) a particle of any composition with a continuous polymer surface coating of any thickness or (ii) a particle of any composition with a polymer content of  $\geq 1\%$  w/w.
  - e. <u>'solid'</u> means a substance or a mixture which does not meet the definitions of liquid or gas.

f. 'gas' means a substance which (i) at 50 oC has a vapour pressure greater than 300 kPa (absolute); or (ii) is completely gaseous at 20 oC at a standard pressure of 101.3 kPa. g. 'liquid' means a substance or mixture which (i) at 50 oC has a vapour pressure of not more than 300 kPa (3 bar); (ii) is not completely gaseous at 20 oC and at a standard pressure of 101.3 kPa; and (iii) which has a melting point or initial melting point of 20 oC or less at a standard pressure of 101.3 kPa.



## Proposed restriction – derogations

- 3. Paragraph 2a and 2b shall not apply to:
  - a. Polymers that occur in nature that have not been chemically modified (other than by hydrolysis).
  - b. Polymers that are (bio)degradable, as set out in the criteria in Appendix X.
- 4. Paragraph 1 shall not apply to the placing on the market of:
- ⇒ a. Substances or mixtures containing microplastics for use at industrial sites.
- b. Medicinal products for human or veterinary use.
  - c . Substances or mixtures that are regulated in the EU under Regulation (EC) No xxx/xxxx on Fertilising Products

Labelling requirements according to Paragraph 7

Reporting requirements according to Paragraph 8



# Proposed restriction – derogations (cont.)

- 5. Paragraph 1 shall not apply to the placing on the market of:
- → a. Substances or mixtures containing microplastic where the microplastic is both (i) contained by technical means throughout the whole lifecycle to prevent releases to the environment and (ii) any microplastic containing wastes arising are incinerated or disposed of as hazardous waste.
- b. Substances or mixtures containing microplastic where the physical properties of the microplastic are permanently modified when the substance or mixture is used such that the polymers no longer fulfil the meaning of a microplastic given in paragraph 2(a).
- c . Substances or mixtures containing microplastic where the microplastic is permanently incorporated into a solid matrix when used

Labelling requirements according to Paragraph 7 Reporting requirements according to Paragraph 8



# The request from the Commission (nov 2017)

- Prepare an Annex XV dossier in view of a <u>possible restriction of synthetic water-insoluble polymers</u> of 5mm or less in any dimension (i.e. microplastic particles)
- Member States are already taking measures to prohibit use in some products, despite uncertainties in terms of risks/impacts (i.e. scientific research is ongoing); restriction process under REACH must be triggered.
- Commission is of the opinion that a <u>potential risk to the environment may arise</u>
   from the presence of microplastic particles used in the production of products for
   consumer and professional use that get into the aquatic environment, and that this
   risk needs to be addressed on a Union-wide basis
- ECHA should assess the need to include additional criteria in the definition of microplastic particles (e.g. biodegradability, solid state in the aquatic environment).

