

EGAT Study

DENTAL PART: UPDATE 2013



EGAT Study

Dental part



EGAT 1/3 - present



EGAT Study >> Periodontal disease

Dental part

- ▶ Prevalence
- ▶ Risk factors
- ▶ Microbial profiles
- ▶ Periodontitis << >> Systemic disease



Periodontitis & Systemic disease

- ▶ CVD
- ▶ Diabetes mellitus
- ▶ Chronic kidney disease



Periodontal Infection

Bacteria

Bacterial Products
LPS, Fimbriae

Inflammatory mediators
IL-1, INF, IL-6, IL-8

Blood stream

Systemic inflammatory process

Acute phase proteins
CRP, TNF- α , IL-1

****Inflammation**

Heart & blood vessels

Endothelial injury
Lipid deposition
Monocyte migration
Smooth muscle proliferation

CVD

CKD

Liver & pancreas

Insulin resistance
Glucose tolerance

Diabetes

Natural History of Periodontitis



asynchronous multiple burst

Natural History of Periodontitis

Asynchronous multiple burst pattern

- Stable / Active sites
- Disease Activity >> Inflammation

“ **Disease** Progression ”



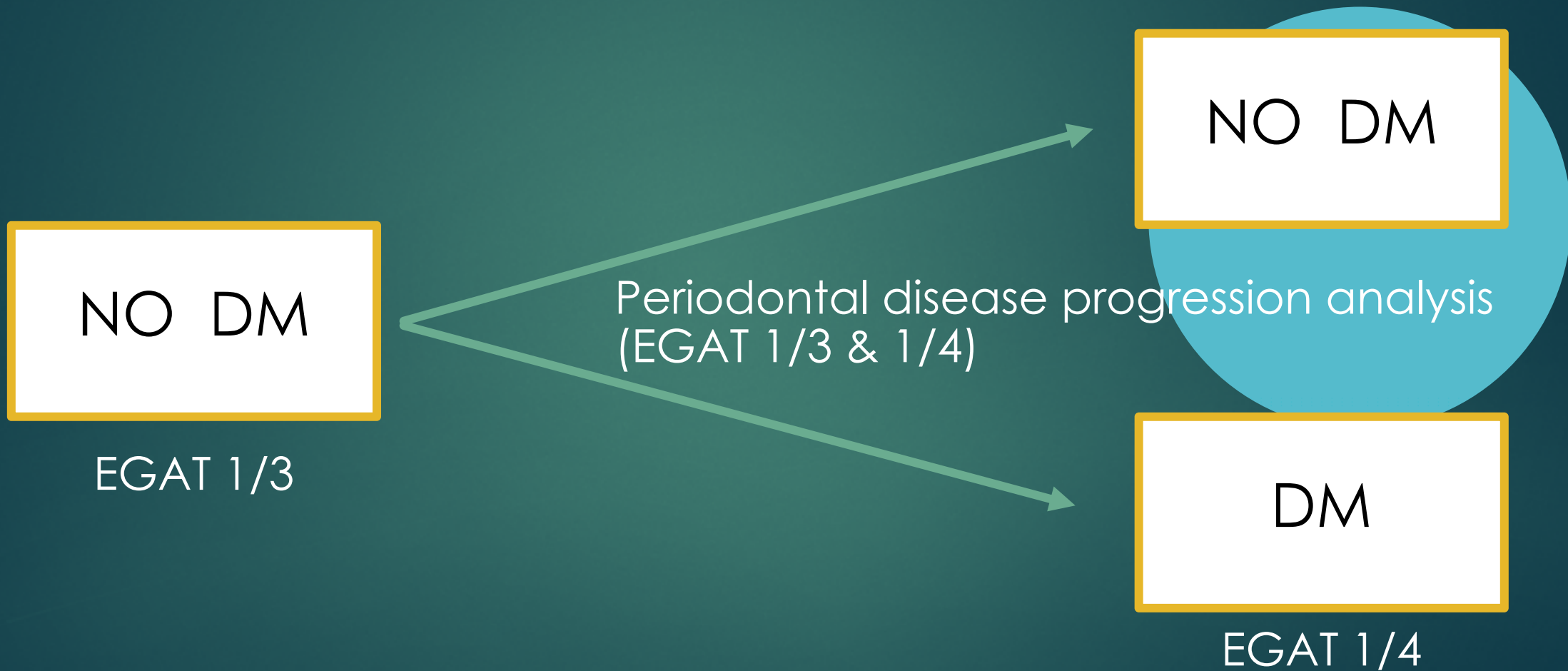
Periodontal disease progression and the alterations of plasma glucose level

5-YEAR-COHORT STUDY

Objective

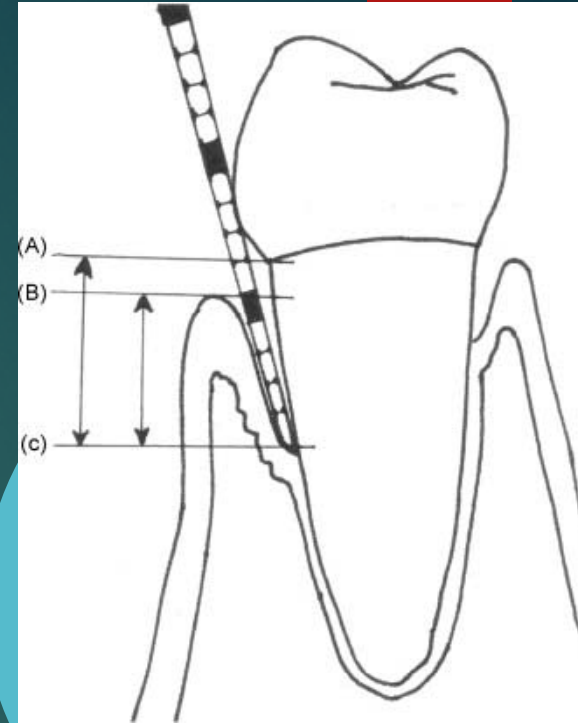
- ▶ To determine the association between **periodontal disease progression** and the **DM** **development**

Methods

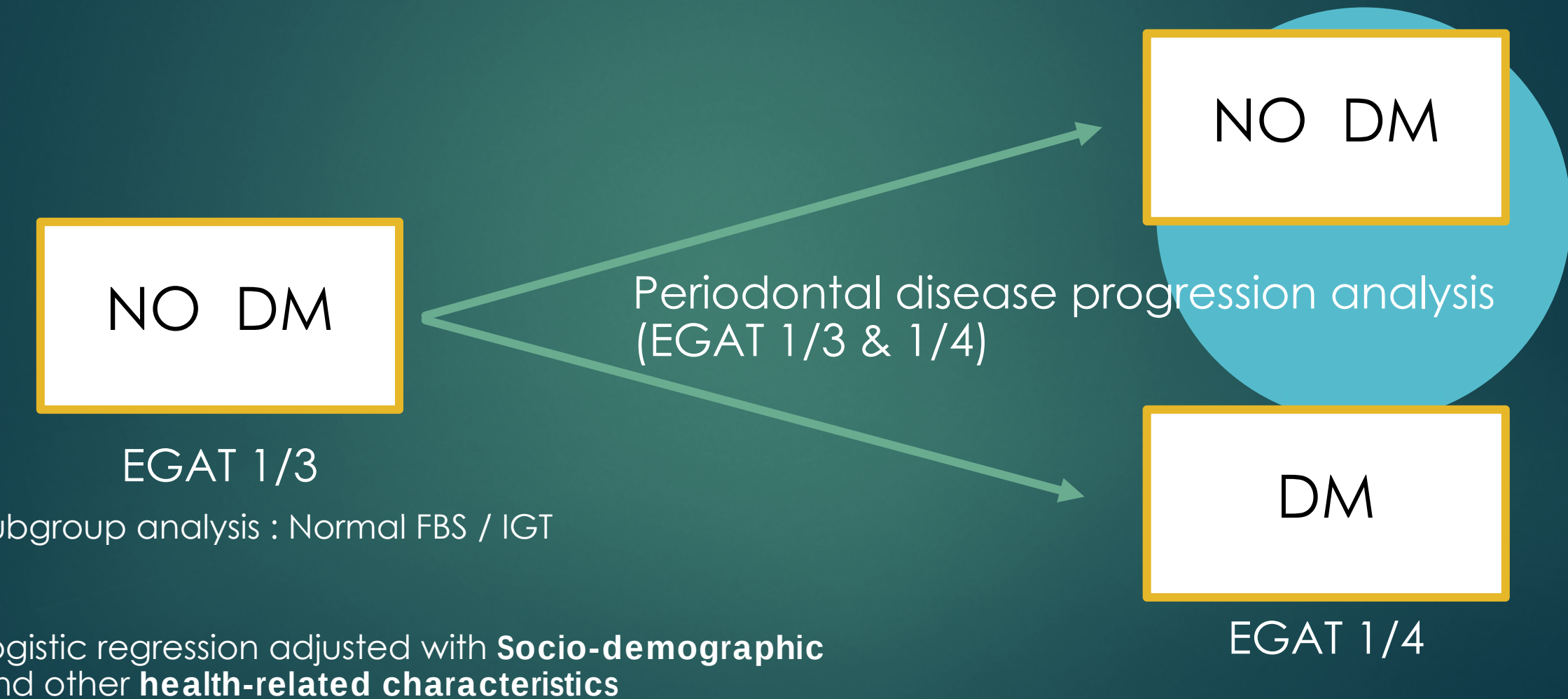


Disease **progression**

- Clinical attachment level (CAL)
- 6 sites / tooth
- ≥ 3 mm = progression
- Grouping by % sites with progression (tertiles):
Mild / Moderate / Severe



Methods



Results

(Dummy tables)

Normal / IGT

		DM	No DM
Periodontitis Progression	Mild		
	Moderate		
	Severe		



Discussion



- Few periodontitis progression studies
(short term & retrospective studies)
- Integral and systematical periodontal data
- **Benefit of disease activity control**

ขอขอบพระคุณ

- ▶ ภาควิชาอายุรศาสตร์ คณะแพทยศาสตร์ โรงพยาบาลรามาธิบดี มหาวิทยาลัยมหิดล
- ▶ หน่วยทันตกรรมพระราชทาน คณะทันตแพทยศาสตร์ จุฬาลงกรณ์มหาวิทยาลัย
- ▶ ผู้สนับสนุนทุนวิจัย:
สสส., วช.