

changing diabetes barometer international seminar

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“Diabetes in the Community” - 12 years of chronic disease management program

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Diabetes in Israel 2007

- 300,000 diabetes patients in 2007 (National indicators program)
- Clalit share 70%, insure 53% of Israeli population
- Low socioeconomic status Israel 13%
- Clalit 40 %
- 55% above age 55 in Israel
- Clalit 80%

Clalit Health Services - Background

- Israeli largest HMO: insures 53% of Israeli population, 3.8 million members
- Insures mainly the 6th socio-economic lower deciles of the population
- 1,300 clinics nationwide
- 3,000 primary physicians 2,000 nurses in primary care

The beginning – Diabetes care in Clalit 1995

- 22.2/1000 diabetes patients in national register
- No diabetes register in primary care
- Major differences in knowledge about diabetes among primary care providers – treatment by consultants
- Few community diabetes centers of Clalit (referral to hospitals)
- No medical policy concerning diabetes
- Primary care providers restricted in performing HbA1c, microalbumin in urine and LDL cholesterol tests
- Few health education materials for diabetes patients

Objectives

Implementation of St Vincent declaration of WHO (1989)

- To improve diagnosis of diabetes patients
- To improve follow up of diabetes and related diseases
- To improve control of diabetes and related diseases
- To improve early detection and appropriate treatment of diabetes complications
- To establish a chronic disease management model in Clalit

Driving forces

Chronic
Diseases
Care Model

Continuous
quality
improvement

Bodenheimer T, Wagner EH,
Grumbach K. JAMA.
2002; 288: 1775-9

Quality Circle

Goals, indicators

Data comparison
to the goals

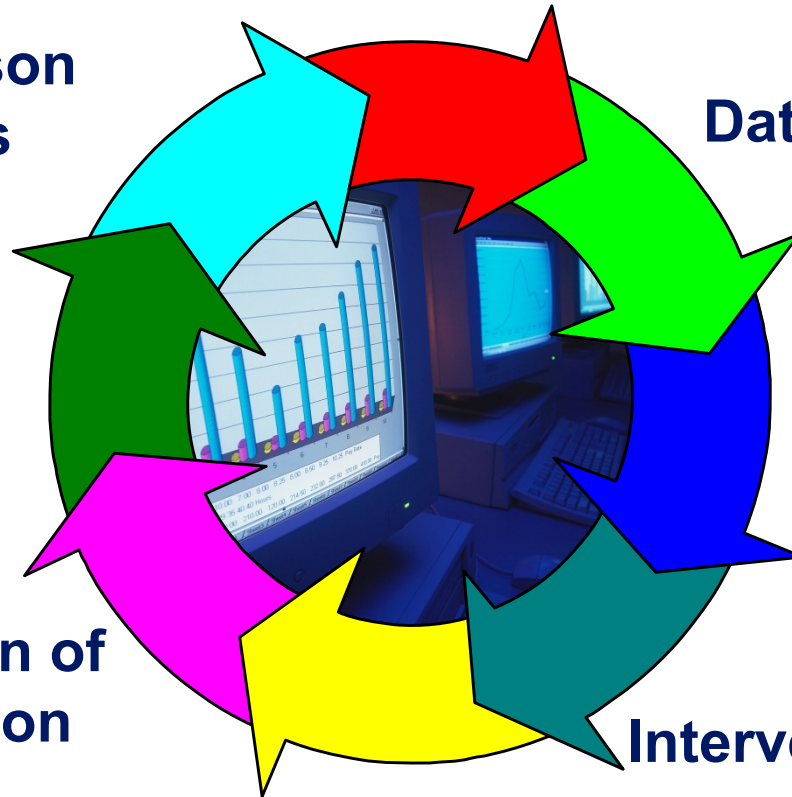
Data gathering

Data gathering

Problem
analysis

Implementation of
the intervention

Intervention planning



The first steps - 95-96

Change in medical policy

- Clinical guidelines on Diabetes type II and implementation to primary care units in Clalit

Intervention program CME

Contents:

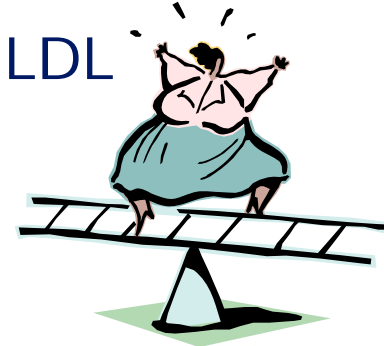
- What is diabetes? Diagnosis and follow up
- Interdisciplinary, uniform appraisal of subjective competence knowledge and satisfaction



95-96 The first steps

Organization of infrastructure of the project

- Multidisciplinary intervention teams: family physicians, primary care nurses, diabetologists, dietitians, health educators
- Establishing communication among representatives of all providers of diabetes care in the community
- Diabetes representative in each primary care clinic
- Ending of restriction on performance HbA1c, LDL cholesterol, microalbumin



96-97

Organization of work of primary care team

- “Clalit’s Policy declaration” – Diabetic care in the hands of primary care teams
- Register of diabetes patients in primary care clinic
- Diabetic follow up sheet designed for primary care

CME intervention

Contents: oral diabetes treatment, empowerment of diabetes patient



Years 97-98

Intervention CME: insulin treatment

Follow up and feedback

- Manual data collection sample of 876 patients
- Feedback to the districts



Years 98-99

Organization of work:

- computerized electronic record
- register in the clinics - implementation
- follow up sheet
- reminders for better follow up and control of diabetes
- reports for audit of diabetes care

CME: UKPDS, diabetic foot

Data collection: Cross sectional study - prevalence of amputations among diabetes patients

Years 1999-2000

Policy: New diabetes guidelines

Process:

- Adjustment to problems in primary care in Clalit
- Local ownership
- Multidisciplinary
- Evidence based

Intervention: CME

- Guidelines implementation

Health education

- New set of education material (6 brochures)

Follow up and feedback

- Manual data collection from 2857 randomized medical records

Situation in 2000

- Improvement in diabetes diagnosis and report to national register from 22.2/1000 to 42/1000
- Improvement in follow up from 22% HbA1c performance at least once a year to 63%
- No improvement in diabetes control
- Diabetes control worse among Arabic population

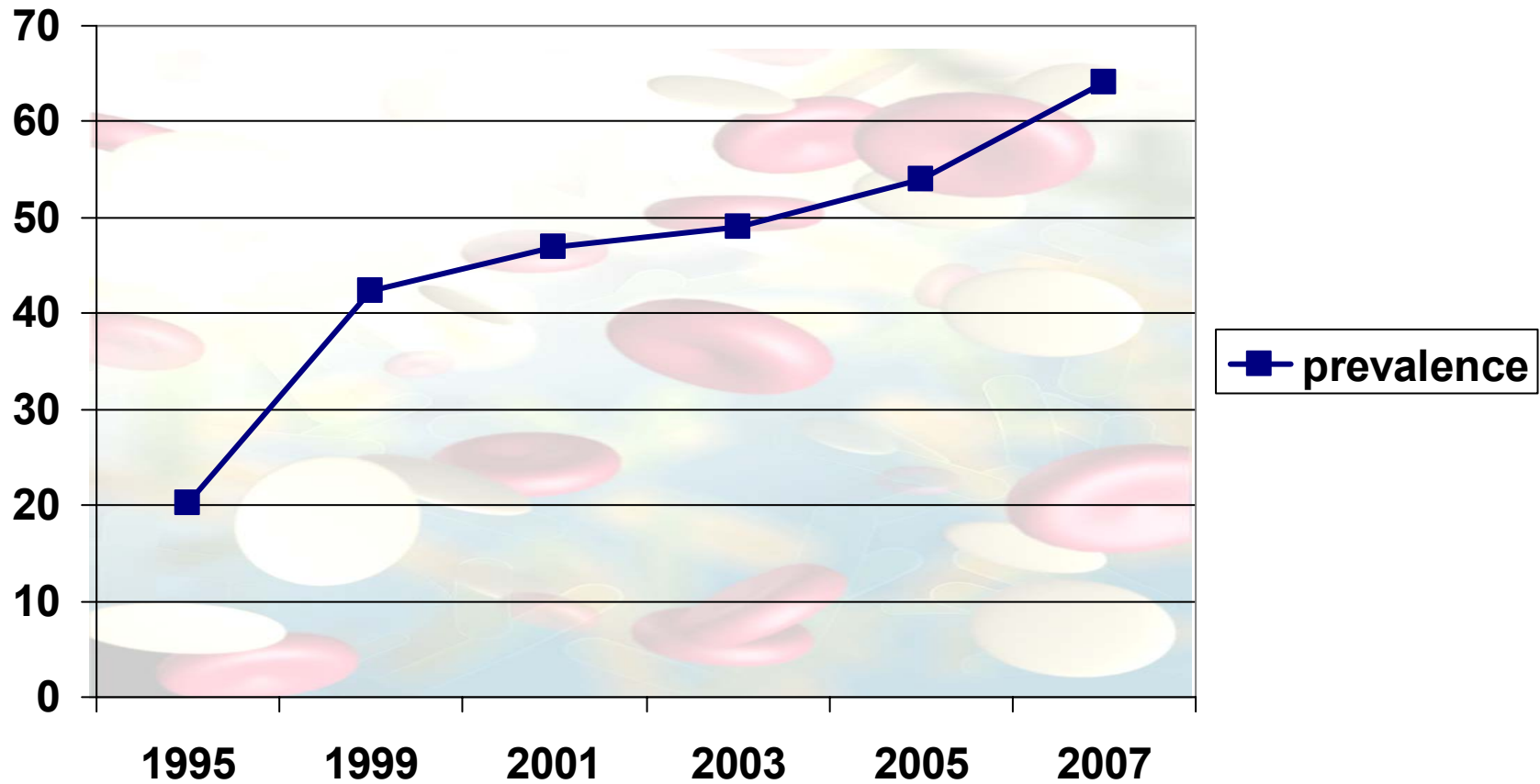
Interventions 2000-2007

- CME focused on diabetes control
- Special task force for Arabic population composed mainly from Arabic professionals, intervention among population and providers
- Focus on health education for diabetes patients: brochures, videos, website, workshops (everything in Hebrew, Arabic and Russian)
- Computerized indicators of care
- Continuous feedback to the providers; from the level of whole organization to the level of individual (physician)

Special achievements

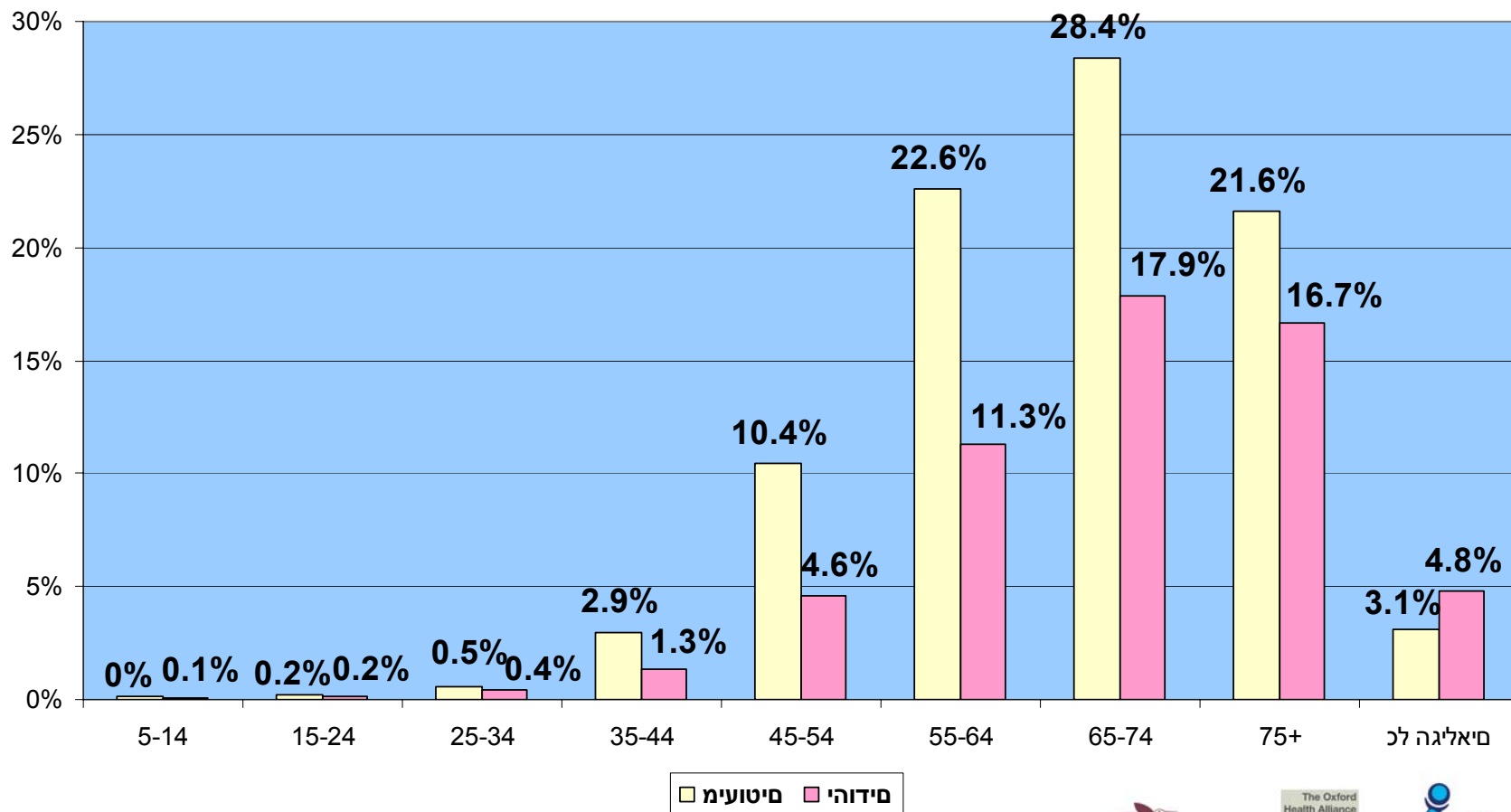
- Updating guidelines every 2-3 years
- Being the 1st in the world to write special comprehensive guidelines for the treatment of diabetic and chronic wounds
- Nationwide ethnic adaptation of programs
- Next year – the 1st to start a nationwide program of identifying and treating pre-diabetes.
- Next year – the 1st to start insulin at the level of the primary physician with the support of a telephonic “hot-line system”

Prevalence of diabetes patients in Clalit for 1000 members Years 1995-2005

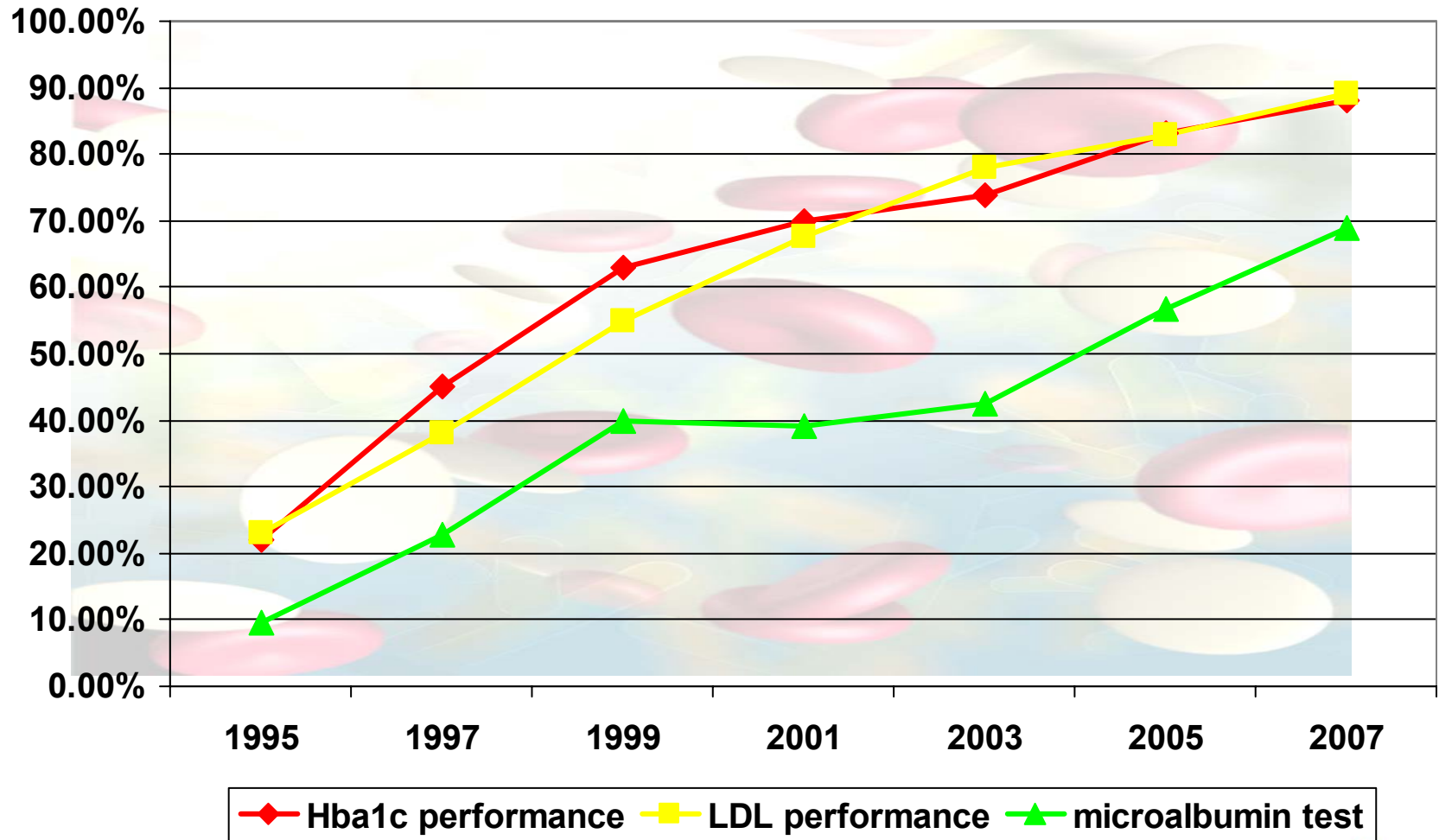


Diabetes prevalence in Clalit population according to ethnic groups in 2003

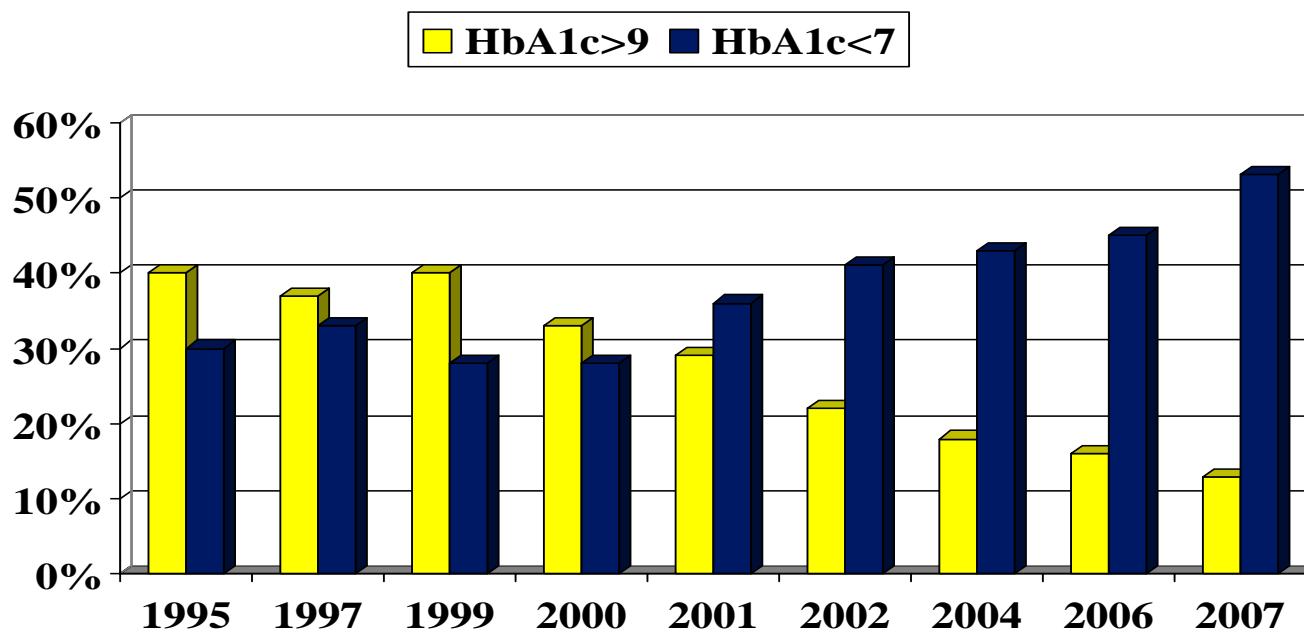
מיאליג יפל מידוהיו מיטועים ברקב הלחמה תוחיכש 2003



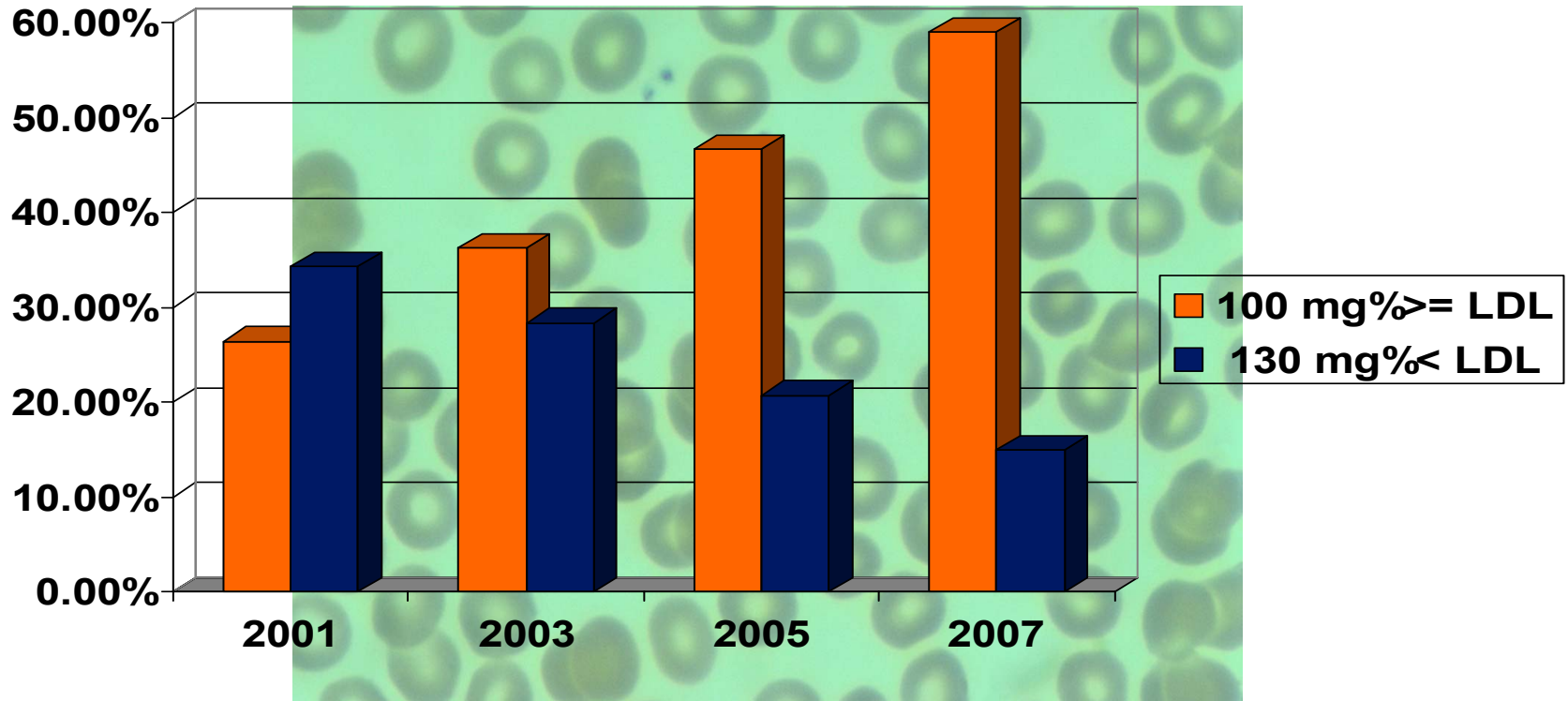
Diabetes follow up 1995-2007



Diabetes control according to HbA1c 95-07



LDL cholesterol control 01-07



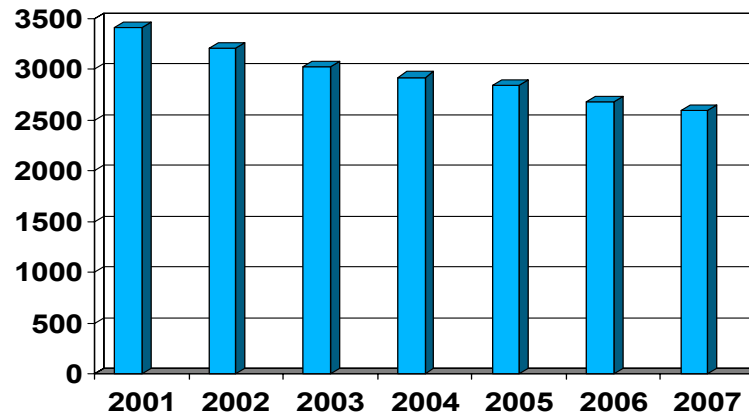
Amputation survey

- By analyzing the Israeli amputation Data from the M.O.H we learn –
 - Most of the amputations of diabetics, “moved” from the seventh decade to the eight decade
 - Improvement of care expressing itself by reduction of amputations
 - 2002 – 0.65 % of diabetic patients
 - 2006 – 0.48 % of diabetic patients

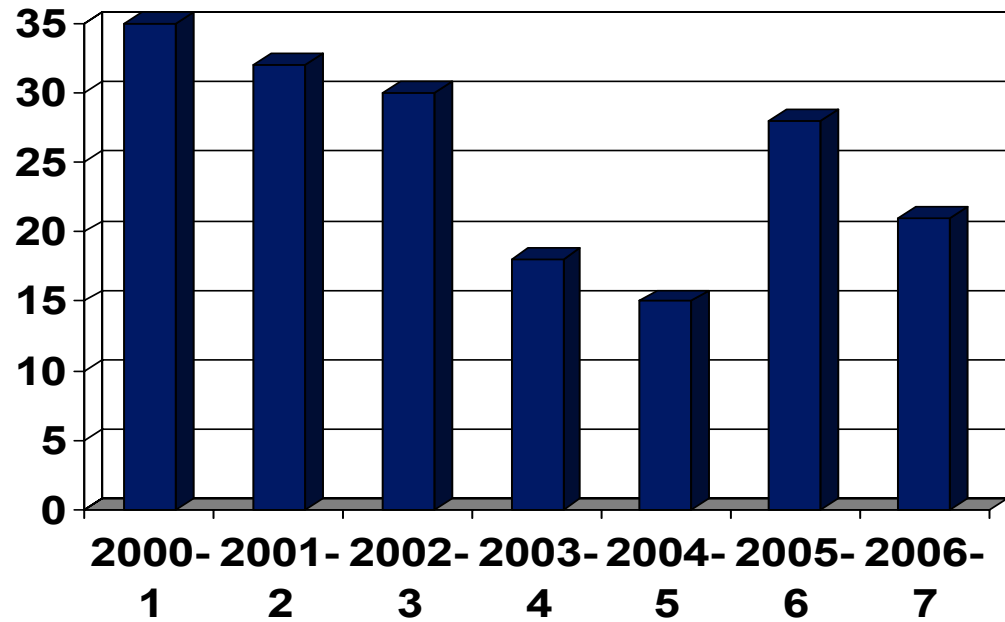
26% improvement

The financial impact

- Cost of diabetic patient (median)



Annual cost containment



The pillars of the program

- Primary care teams as major providers of diabetes care
- Continuous Quality Improvement of a Chronic Disease Care Model
- Ethnic diversity and adaptation of programs
- Computerized decision support systems
- Direct dialogue between primary care teams and consultants

"No one specific intervention, if used alone, led to major improvements in management of chronic diseases "

Renders CM, Valk GD, Griffin SJ, Wagner EH, Eijk Van JT, Assendelft WJ. Interventions to improve the management of diabetes in primary care, outpatient, and community settings: a systematic review. [Diabetes Care. 2001;24:1821-33)

Thank you for your attention



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