

## 3-7 单元

### 长期并发症

#### 概述

虽然两种主要类型的糖尿病病理生理学以及治理方法各有不同，但是它们的相同之处是都可能引发长期微血管和大血管的并发症，如视网膜疾病变、肾病、大血管疾病、周围神经病变和自主神经病变。由这些并发症所引发的发病率和死亡率都很高。

微血管并发症的先兆是糖尿病症状持续时间较长以及代谢控制较差。但是，如果早期采取强化治疗可以缓解这些并发症的发展。因此，必须采取相关措施尽早发现这些并发症。

由于 2 型糖尿病可能患病多年后才得到诊断，高达 30% 的患者在确诊之时已经出现并发症，因此应该在诊断糖尿病的同时对并发症进行筛查，以后每年一次。1 型糖尿病成人患者必须在确诊 5 年以内进行并发症筛查，以后每年一次。

#### 目的

- 全面了解关于微血管和大血管并发症的病理生理学
- 学员需要了解糖尿病教育者在建议和提倡并发症早期筛查和及时治疗（有些是对并发症的筛查）发挥的作用
- 讨论长期并发症监控和治疗的含义
- 了解长期并发症对患者及其家人心理造成的影响
- 讨论在并发症防治过程中需要态度诚恳，采取积极相应措施，避免使用恐吓方法或威胁性的言语

# 3-7d 单元

## 大血管疾病

### 概述

虽然微血管病变和神经病变可能对糖尿病患者的生活质量带来影响，但是心血管病变的发病率和死亡率最高。相关研究表明，糖尿病患者出现心血管病变的几率至少是普通人的 2 到 4 倍。患糖尿病妇女的风险更高，特别是冠心病。糖尿病血管病变包括所有的主要血管系统——心血管、脑血管以及周围血管。

### 目的

- 了解糖尿病患者大血管病变患病率和死亡率的重要影响
- 了解糖尿病不仅仅是血糖疾病；出现大血管病变的风险很大

### 目标

完成本单元以后，学员可以：

- 讲解不同种族大血管病变的不同表现
- 讲解大血管病变包括冠心病、脑血管病以及周围动脉病变
- 阐述无症状缺血、心绞痛、短暂性脑缺血 (TIAs)、跛行以及静息痛
- 讨论糖尿病患者出现大血管病变的高风险
- 阐述糖尿病为何加大心脏衰竭的风险
- 对 EDIC（糖尿病干预和并发症的流行病防治计划）及其监测研究表明的高血糖会增加大血管病变风险展开讨论
- 认识到中心型肥胖是血管病变风险增加的标志
- 阐述各种风险因素以及多种风险因素的复合效果
- 阐述出现微量白蛋白尿/肾病表明患大血管疾病的风险增加，有必要对大血管风险因素进行强化治疗
- 阐述不同类型的血脂以及治疗目标
- 讨论营养治疗在一级预防和二级预防中的作用
- 讨论治疗过程中生活方式因素的影响（经常锻炼、戒烟、坚持控制体重）
- 讨论心脏病患者使用 HMG-CoA 还原酶抑制剂后 6 个月内可降低大血管病变的风险
- 阐述控制血压对降低中风和心衰风险的作用
- 讨论加强脂代谢紊乱和高血压治疗的好处，即使是针对老年患者
- 讨论二级预防中阿司匹林的使用

- 阐述降低大血管病变风险的临床研究—包括 MicroHOPE、HOT、4S、UKPDS、Heart Protection Study、ACCORD、CARDs、ADVANCE\*

**教学策略**

结合案例分析的循问教学模式

**建议学时**

1 小时

**负责本单元教学的人员**

内分泌科医生、糖尿病教育者、心脏科医生

**学习评价**

作业：描述降低 1 型糖尿病和 2 型糖尿病患病风险的策略之重要性  
针对有家族心脏病史的 2 型糖尿病体重超标患者设计一分关顾计划（应该开展哪些评估项目？）

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