NycoCard®
HbA1c
U-Albumin
CRP
D-Dimer

Point of Care Testing from Axis-Shield PoC
Developments in disease management and rising health care costs have led to increasing interest in *in-vitro* diagnostic near-patient or point of care testing (POCT). The rapid results achieved from point of care testing systems have profound positive effects on medical and economic outcomes. POCT saves time for the physician and for the patient through faster and fewer consultations, and reduces demands on staff resources.

With minimal time taken from test ordering to receipt of results, the physician can, on the basis of the test information at hand, explain therapeutic rationale and start, stop or modify treatment during one patient consultation. In the case of diabetes mellitus for example, immediate, near-patient testing of HbA1c, and subsequent immediate analysis and reporting of the results provide efficient control of this disease and its associated complications. Thus, POCT enhances evidence-based medical decision making and improves medical efficacy and disease management.
NycoCard® READER II

NycoCard® READER II is a Point of Care instrument, designed for rapid and reliable measurements of all NycoCard® tests. With NycoCard® READER II, healthcare professionals in hospitals and in general practice will obtain accurate, quantitative results from all NycoCard® tests. Easy to use. Rapid results. Series of measurements.

1 Instrument

4 Point of Care Tests

NycoCard® HbA1c
NycoCard® U-Albumin
NycoCard® CRP
NycoCard® D-Dimer
HbA1c

3-minute test for monitoring glycated haemoglobin

Measurements of glycohaemoglobin, also known as HbA1c or just A1c, provide an accurate and reliable method of routinely monitoring the quality of metabolic control in persons with diabetes.

The clinical significance of HbA1c, which directly relates to the mean blood glucose value, is well documented in landmark studies such as the Diabetes Control and Complications Trial (DCCT) and the UK Prospective Diabetes Study (UKPDS). These studies demonstrated that individuals who maintained their HbA1c levels at or about the upper limit of normal levels, reduced, delayed or even prevented late complications. Diabetes associations, including the American Diabetes Association (ADA), recommend regular monitoring of metabolic control using HbA1c.

NycoCard®

Results at the Point of Care
Requires:
- only a tiny drop of blood and 3 minutes' test time

Provides:
- immediate results available during the patient consultation
- high quality results using a boronic acid affinity test principle without interference of Hb variants or derivatives

Contributes to:
- improved diabetes patient management
- reduction in late complications

3-minute test for the detection of microalbuminuria

Persistent elevated excretion of albumin in urine indicates the early stages of diabetic nephropathy, known as microalbuminuria or incipient diabetic nephropathy. Early intervention has proved important as the progression of the disease at these early stages may be stopped or even reversed. The albumin excretion of persons with diabetes should be monitored frequently according to international recommendations.
Requires:
- only 50 µL urine sample and
  3 minutes’ test time

Provides:
- quantitative results within
  minutes

Contributes to:
- rapid follow up and improved
diabetes management

PDB ID 1A06 Crystal Structure of Human Serum Albumin Sugio, S., Kashima, A.,
Mochizuki, S., Noda, M., Kobayashi, K.: Crystal Structure of Human Serum Albumin at 2.5
2-minute test to indicate bacterial or viral cause of infection

NycoCard® CRP measures C-reactive protein (CRP), an acute phase protein that increases rapidly after onset of infection. Importantly from a diagnostic point of view, high readings are usually seen in bacterial infection, but only low to moderate levels in viral.

Thus, determining CRP can support the clinical diagnosis of an infection, and so avoid unnecessary use of antibiotics if the test result indicates a viral aetiology.

In addition, CRP levels reflect inflammatory activity during treatment, remission and recurrence of the disease. With follow-up CRP testing, the course of the illness and the efficacy of any antibiotic can therefore be monitored.
Requires:
- only a tiny drop of whole blood and 2 minutes’ test time

Provides:
- immediate results for follow up during patient consultation
- accurate results comparable to hospital laboratory assays

Contributes to:
- more rapid induction of treatment, fewer hospital admissions
- more appropriate use of antibiotics with healthcare cost savings

D-Dimer

3-minute test for the exclusion of thromboembolic disease

The D-Dimer test indicates whether or not there is activation of the fibrinolysis system.

NycoCard® D-Dimer measures D-dimer configurated molecules, which are released into the circulation by the activation of the fibrinolysis system. Through this activation, fibrin is degraded by plasmin to various soluble fragments in which the D-dimer configuration occurs.

Elevated levels of D-Dimer indicate a continuous fibrinolysis process and are a key indicator of Deep Venous Thrombosis (DVT), Pulmonary Embolism (PE) and Disseminated Intravascular Coagulation disorders.
Requires:
- 50 µL undiluted plasma and three minutes' test time

Provides:
- fast results and combines the speed and simplicity of latex tests, with the analytical quality of ELISA tests.

Contributes to:
- early exclusion of DVT and reduction in the need for costly procedures such as venography

Axis-Shield PoC

Axis-Shield PoC has a portfolio of simple, rapid PoC tests for the physician's office laboratory and other small laboratories that require compact, robust and cost-effective bench-top IVD testing systems. In addition to the NycoCard® products covered in this brochure, we also market Thrombotest™, a test for control of oral anticoagulant therapy.

All these tests, available throughout the world, represent today's contribution to Point of Care testing from Axis-Shield PoC – offering speed, simplicity, reliability and cost-efficiency.

For the future, Axis-Shield PoC aims to be a driving force in the PoC market, dedicated to developing innovative test systems for the benefit of physicians and patients alike.

For more information on our products and distributors, please go to: www.axis-shield-poc.com