



## Napsin A (Clone MRQ-60, Mouse)

- New clone **MRQ-60** (high dilution)
- Marker for lung adenocarcinomas (more sensitive and more specific than TTF-1)
- Subclassification of ovarian carcinomas  
(clear cell histologic type: *Am J Clin Pathol* 2014; 142: 735 and 830)

### For discriminating:

- Primary lung adenocarcinoma vs. metastatic disease
- Adenocarcinoma vs. squamous cell carcinoma of the lung
- Lung adenocarcinoma (Napsin A+) vs. mesothelioma (Napsin A-)
- Origin lung (TTF-1+/- Napsin A+) vs. thyroid (TTF-1+ Napsin A-)

Lung carcinoma subtypes	TTF-1	Napsin A	Sox-2	p63	p40 (ΔNp63)	CK5	CK14
Lung adenocarcinoma (well differentiated)	+	+	-	-/+	-	-	-
Lung adenocarcinoma (poorly differentiated)	-/+	+	-	-/+	-	-	-
Squamous cell carcinoma	-	-	+	+	+	+	+

Tumour origin	GCDFP-15	Mamma-globin	CDX2	PSA	TTF-1	Napsin A polyclonal	Napsin A MRQ-60
Breast cancer	+	+	-	-	-	-	-
Lung adenocarcinoma	-	-	-	-	+	+	+
Colon cancer	-	-	+	-	-	-/+	-
Prostate cancer	-	-	-	+	-	-	-

The monoclonal napsin A antibody MRQ-60 (mouse) is characterised by **higher specificity/dilution** compared with polyclonal napsin A antibodies. **Napsin A** belongs to the group of pepsin-like aspartyl proteases (its name is derived as follows: *Novel aspartic proteinase of the pepsin family*). Napsin A is expressed in the normal **lung** parenchyma in type II pneumocytes and in the proximal and distal convoluted tubules of the **kidney\***. The enzyme is present in the lung in the cytoplasm (lysosomes) of type II pneumocytes, Clara cells and alveolar macrophages (probably secondary to phagocytosis) and to a lesser degree in pancreatic acini and ducts. **Napsin A is a more sensitive and more specific marker for lung adenocarcinomas than TTF-1.** **More than 85% of primary lung adenocarcinomas are positive for napsin A.** Squamous cell carcinomas and small cell carcinomas of the lung are characteristically negative for napsin A. Adenocarcinomas of the breast and pancreas, as well as of the biliary tract and colon only rarely stain with napsin A. Pulmonary adenocarcinomas with *enteric differentiation* (PAED) are a special entity in that the vast majority of these cases are negative for napsin A.

\***Renal cell carcinomas** (3-4% of all cancers) are ~57% napsin A-positive (papillary 75-82% napsin A-positive; clear cell 10-43% positive; chromophobric 3% positive). Pax-8 helps to discriminate between tumour origin lung (napsin A+ Pax-8-) versus kidney (napsin A+/- Pax-8+).

## Ordering Information

Antibody	Clone	Species	Dilution	Concentrate			Ready to use/RTU		
				0.1 ml	0.5 ml	1.0 ml	1 ml	7 ml	6 ml
CDX2	EPR2764Y	Rabbit	100-500	235R-14	235R-15	235R-16	235R-17	235R-18	-
CK5	EP1601Y	Rabbit	50-200	305R-14	305R-15	305R-16	305R-17	305R-18	-
CK5/6	D5/16B4	Mouse	50-200	356M-14	356M-15	356M-16	356M-17	356M-18	-
CK14	LL002	Mouse	100-500	314M-14	314M-15	314M-16	314M-17	314M-18	-
CK14	SP53	Rabbit	100-500	314R-14	314R-15	314R-16	314R-17	314R-18	-
GATA3	L50-823	Mouse	100-500	390M-14	390M-15	390M-16	390M-17	390M-18	-
GCFDP-15	23A3	Mouse	50-200	257M-14	257M-15	257M-16	257M-17	257M-18	-
GCFDP-15	EP1582Y	Rabbit	25-100	257R-14	257R-15	257R-16	257R-17	257R-18	-
Mammaglobin	31A5	Rabbit	100-500	280R-14	280R-15	280R-16	280R-17	280R-18	-
Napsin A	MRQ-60	Mouse	100-500	352M-94	352M-95	352M-96	352M-97	352M-98	-
Napsin A	EP205	Rabbit	100-500	352R-14	352R-15	352R-16	352R-17	352R-18	-
p40 ( $\Delta$ Np63)	polyclonal	Rabbit	50-200	-	RP163-05	-	-	-	PDR055
p53	DO-7	Mouse	100-500	453M-94	453M-95	453M-96	453M-97	453M-98	-
p63	4A4	Mouse	100	-	-	Z2003L	-	-	413751F
Pax8	polyclonal	Rabbit	25-100	363A-14	363A-15	363A-16	363A-17	363A-18	-
Pax8	MRQ-50	Mouse	50-200	363M-14	363M-15	363M-16	363M-17	363M-18	-
PSA	ER-PR8	Mouse	50-200	324M-14	324M-15	324M-16	324M-17	324M-18	-
Sox2*	SP76	Rabbit	50-200	371R-14	371R-15	371R-16	371R-17	371R-18	-
TTF-1	EP229	Rabbit	50-200	343R-14	343R-15	343R-16	343R-17	343R-18	-
WT1	6F-H2	Mouse	100-500	348M-94	348M-95	348M-96	348M-97	348M-98	-

\* Stem cell and pluripotency marker, \*\* 15 ml RTU (343M-99) and 25 ml (343M-90) are also available

### Napsin A references

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