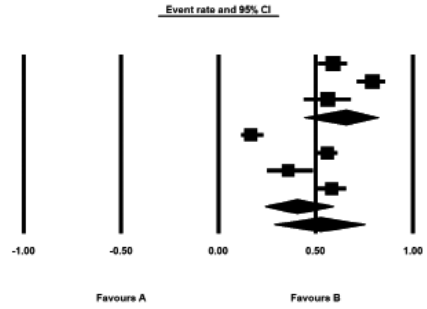
Benign result (P=0.405)

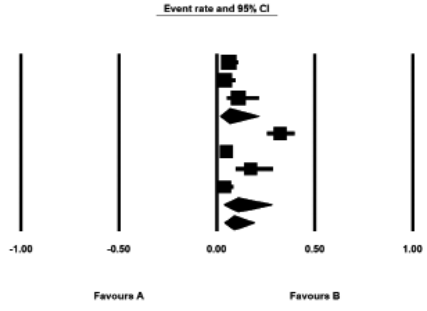
Group by Subgroup within study	Study name	Subgroup within study	Outcome	Event rate	Lower limit	Upper limit	Z-Value	p-Value	Total	Relative weight
CNB	Choi, 2014	CNB	Benign	0.589	0.516	0.658	2.372	0.018	106 / 180	34.56
CNB	Lee, 2014	CNB	Benign	0.792	0.712	0.854	6.067	0.000	99 / 125	33.11
CNB	Na, 2012	CNB	Benign	0.563	0.440	0.678	0.997	0.319	36 / 64	32.33
CNB				0.657	0.442	0.822	1.439	0.150		
FNA	Choi, 2014	FNA	Benign	0.167	0.119	0.228	-8.047	0.000	30 / 180	24.78
FNA	Lee, 2014	FNA	Benign	0.560	0.511	0.609	2.377	0.017	218 / 389	26.05
FNA	Na, 2012	FNA	Benign	0.359	0.252	0.483	-2.219	0.026	23 / 64	23.69
FNA	Yoon, 2018	FNA	Benign	0.583	0.509	0.654	2.182	0.029	102 / 175	25.48
FNA				0.404	0.241	0.592	-1.001	0.317		
Overall				0.526	0.287	0.754	0.203	0.839		



A

AUS/FLUS (P=1.000)

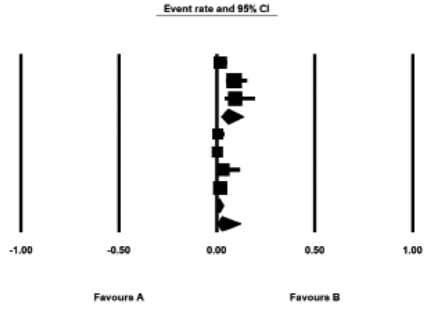
Group by Subgroup within study	Study name	Subgroup within study	Outcome	Event rate	Lower limit	Upper limit	Z-Value	p-Value	Total	Relative weight
CNB	Choi, 2014	CNB	AUS	0.061	0.034	0.107	-8.780	0.000	11 / 180	34.68
CNB	Lee, 2014	CNB	AUS	0.040	0.017	0.093	-6.963	0.000	5 / 125	32.13
CNB	Na, 2012	CNB	AUS	0.109	0.053	0.212	-5.236	0.000	7 / 64	33.18
CNB				0.065	0.017	0.215	-3.816	0.000		
FNA	Choi, 2014	FNA	AUS	0.322	0.258	0.394	-4.662	0.000	58 / 180	26.08
FNA	Lee, 2014	FNA	AUS	0.049	0.031	0.075	-12.622	0.000	19 / 389	25.51
FNA	Na, 2012	FNA	AUS	0.172	0.098	0.284	-4.746	0.000	11 / 64	24.53
FNA	Yoon, 2018	FNA	AUS	0.040	0.019	0.082	-8.238	0.000	7 / 175	23.88
FNA				0.109	0.037	0.281	-3.552	0.000		
Overall				0.088	0.039	0.190	-5.176	0.000		



B

FN/SFN (P=0.105, 0.021×5)

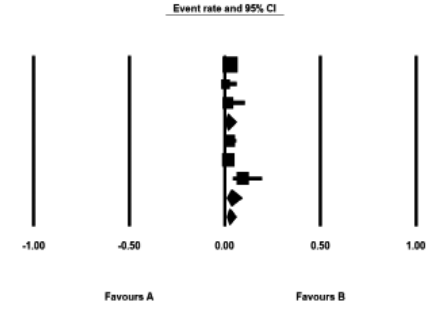
Group by Subgroup within study	Study name	Subgroup within study	Outcome	Event rate	Lower limit	Upper limit	Z-Value	p-Value	Total	Relative weight
CNB	Choi, 2014	CNB	FN	0.017	0.005	0.050	-7.003	0.000	3 / 180	27.61
CNB	Lee, 2014	CNB	FN	0.088	0.049	0.152	-7.406	0.000	11 / 125	38.55
CNB	Na, 2012	CNB	FN	0.094	0.043	0.193	-5.290	0.000	6 / 64	33.83
CNB				0.058	0.023	0.136	-5.792	0.000		
FNA	Choi, 2014	FNA	FN	0.006	0.001	0.038	-5.173	0.000	1 / 180	18.97
FNA	Lee, 2014	FNA	FN	0.003	0.000	0.018	-5.953	0.000	1 / 389	19.01
FNA	Na, 2012	FNA	FN	0.031	0.008	0.117	-4.780	0.000	2 / 64	28.07
FNA	Yoon, 2018	FNA	FN	0.017	0.006	0.052	-6.952	0.000	3 / 175	33.96
FNA				0.011	0.004	0.032	-8.326	0.000		
Overall				0.026	0.005	0.121	-4.347	0.000		



C

Suspicious for malignancy (P=1.000)

Group by Subgroup within study	Study name	Subgroup within study	Outcome	Event rate	Lower limit	Upper limit	Z-Value	p-Value	Total	Relative weight
CNB	Choi, 2014	CNB	SuspicousMalig	0.028	0.012	0.065	-7.839	0.000	5 / 180	55.19
CNB	Lee, 2014	CNB	SuspicousMalig	0.004	0.000	0.060	-3.899	0.000		17.16
CNB	Na, 2012	CNB	SuspicousMalig	0.016	0.002	0.103	-4.111	0.000	1 / 64	27.65
CNB				0.017	0.005	0.060	-6.054	0.000		
FNA	Choi, 2014	FNA	SuspicousMalig	0.022	0.008	0.058	-7.484	0.000	4 / 180	30.89
FNA	Lee, 2014	FNA	SuspicousMalig	0.018	0.009	0.037	-10.486	0.000	7 / 389	35.41
FNA	Na, 2012	FNA	SuspicousMalig	0.094	0.043	0.193	-5.290	0.000	6 / 64	33.69
FNA				0.034	0.013	0.088	-6.487	0.000		
Overall				0.026	0.012	0.057	-8.834	0.000		



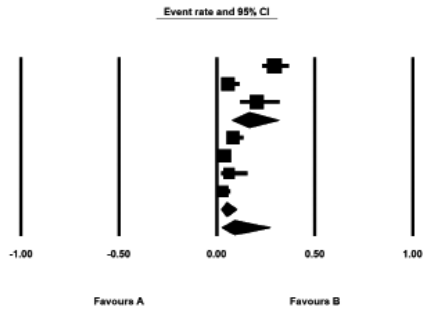
D

Supplementary Fig. 1. Forest plot of proportional meta-analysis in initially non-diagnostic nodules. (A) Benign. (B) Atypia of undetermined significance/follicular lesion of undetermined significance (AUS/FLUS). (C) Follicular neoplasm/suspicious for follicular neoplasm (FN/SFN). (D) Suspicious for malignancy.

(*Continued to the next page*)

Malignant (P=0.110, 0.022×5)

Group by Subgroup within study	Study name	Subgroup within study	Outcome	Statistics for each study						Relative weight	Relative weight
				Event rate	Lower limit	Upper limit	Z-Value	p-Value	Total		
CNB	Choi, 2014	CNB	Malig	0.294	0.232	0.365	-5.344	0.000	53 / 180	37.40	
CNB	Lee, 2014	CNB	Malig	0.056	0.027	0.113	-7.261	0.000	7 / 125	29.85	
CNB	Na, 2012	CNB	Malig	0.203	0.122	0.319	-4.399	0.000	13 / 64	32.76	
CNB				0.166	0.079	0.315	-3.770	0.000			
FNA	Choi, 2014	FNA	Malig	0.083	0.051	0.134	-8.892	0.000	15 / 180	28.22	
FNA	Lee, 2014	FNA	Malig	0.039	0.023	0.063	-12.214	0.000	15 / 389	28.40	
FNA	Na, 2012	FNA	Malig	0.063	0.024	0.155	-5.244	0.000	4 / 64	20.75	
FNA	Yoon, 2018	FNA	Malig	0.029	0.012	0.067	-7.772	0.000	5 / 175	22.63	
FNA				0.050	0.024	0.101	-7.568	0.000			
Overall				0.091	0.027	0.271	-3.447	0.001			



E

Supplementary Fig. 1. (Continued) (E) Malignant. CI, confidence interval.