St. Gallen 2015
Tailoring Therapy: Towards Precision Treatment of Patients with Early Breast Cancer

Consensus & Controversy
International Consensus Panel
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Expert Opinion on Areas of Controversy

- The vast majority of the questions are about controversial issues.
- The opinion of the panel members is used to implement guidance for treatment choice.
- This is the unique feature of the St. Gallen Consensus.
Panelists’ Answers

- Questions have been prospectively reviewed by the Panelists and revised to be as clear as possible. *Semantic discussions on the day are discouraged!!*

- Panelists are asked to answer either
  
  1 Yes  
  2 No

  for most questions

  or in certain cases

  select from mutually exclusive choices, 1, 2, 3, 4, etc.

- Option for *9 Abstain* if Panelist has insufficient data, lack of specific expertise on the issue, or conflict of interest. Do not hesitate to abstain if appropriate.
Practice Questions

The seating capacity of this hall is greater than 1500

1 Yes  2 No  9 Abstain

The seating capacity of this hall is (select one):

1. Not more than 499
2. From 500 to 999
3. From 1000 to 1999
4. At least 2000
9. Abstain
LET’S START
Surgery of the Primary

In women undergoing breast conserving surgery for invasive BC and proceeding to standard radiation and adjuvant systemic therapy the *minimum* acceptable surgical margin is:

1. No ink on invasive tumor? 91%
2. 1 – 2 mm clearance? 8.1%
3. > 2 – 5 mm clearance? 0
4. > 5 mm clearance? 0
5. Margin is irrelevant? 0
9. Abstain 0

Multifocal and multicentric (unilateral) tumors can be treated with breast conservation provided margins are clear and whole breast RT is planned.

Multifocal 71.4%/14.3/14.3 1Y/2N/9A
Multicentric 79.5%/20.5/0 1Y/2N/9A
Surgery of the Primary

- Should the margin required be dependent on tumor biology?
  0/100%/0  1Y/ 2N/ 9A

- Should the margin required be greater if age < 40?
  0/100%/0  1Y/ 2N/ 9A

- Should the margin required be greater if lobular?
  0/100%/0  1Y/ 2N/ 9A

- Should the margin required be greater after neoadjuvant therapy?
  8/90%/2  1Y/ 2N/ 9A

- Should required margin be greater in presence of extensive intraductal component?
  20/80/0  1Y/ 2N/ 9A

- Should required margin be greater for pure DCIS than for invasive disease?
  20/80%/0  1Y/ 2N/ 9A
Surgery Following Neo-Adjuvant Chemotherapy

In a patient who is clinically node positive at presentation who downstages after chemotherapy:

- Is SN Biopsy appropriate? 90/7/3% 1Y/2N/9A
- Can ALND be avoided if 1 SN positive? 10/90/0 (the vote was not repeated for the following questions and was assumed to be the same) 1Y/2N/9A
- Can ALND be avoided if 2 SN positive? 1Y/2N/9A
- Can ALND be avoided if > 2 SN positive? 1Y/2N/9A

Should the entire area of the original primary be resected after downstaging? 9%/89%/2% 1Y/2N/9A
Surgery of the Axilla

In patients with macro-metastases in 1-2 sentinel nodes, completion axillary dissection can safely be omitted following:

- Mastectomy (no radiotherapy planned) 0/100%/0 1Y/2N/9A
- Mastectomy (radiotherapy planned) 52%/48%/0 1Y/2N/9A
- Conservative resection with radiotherapy using standard tangents 67/33/0 1Y/2N/9A
- Conservative resection with radiotherapy using high tangents to include the lower axilla 94%/3%/2% 1Y/2N/9A
Partial Breast Irradiation

Following breast conserving surgery, partial breast irradiation may be used:

• As the definitive irradiation, without whole breast irradiation in ASTRO/ESTRO “suitable” patients?  
  1Y/ 2N/ 9A  
  49/40/11%

• As the definitive irradiation, without whole breast irradiation in ASTRO “cautionary” / ESTRO “intermediate” patients?  
  1Y/ 2N/ 9A  
  2/78/22%

• Only in the absence of adverse tumor pathology?  
  (ASTRO/ESTRO guidelines allow any grade and are silent on multi-gene tests)  
  1Y/ 2N/ 9A  
  22/60/18%
Hypofractionated Breast Irradiation

Following breast conserving surgery, hypofractionated whole breast irradiation may be used in:

- Patients aged 50 years or older without prior chemotherapy or axillary lymph node involvement: 89/2/9 %
- Patients younger than 50 years: 71/2/27%
- Those with prior chemotherapy or axillary lymph node involvement: 51/18/31 %
Regional Node Irradiation

 Following breast conserving surgery, radiation should include

*If nodes are negative*: 100/0/0/0/0

1. Breast only
2. Breast and regional nodes but not IMN
3. Breast and regional nodes including IMN
9. Abstain

*If nodes are positive*: 54/30/16 %

1. Breast only
2. Breast and regional nodes but not IMN
3. Breast and regional nodes including IMN
9. Abstain
Radiation Therapy: After Mastectomy

Should post mastectomy RT be standard for patients with:

- T size >= 5 cm? 90/10/0 1Y/2N/9A
- N+ 1 to 3 all patients? 32/64/4 1Y/2N/9A
- N+ 1 to 3 with 95 adverse pathology? 87/7/7 1Y/2N/9A
- N+ 1 to 3 at young age (< 40 yrs)? 51/37/12 1Y/2N/9A
- Positive sentinel node biopsy but no axillary dissection? 70/17/13 % 1Y/2N/9A
- pN0 after axillary dissection without SNB and < 8 nodes examined? 0/95/5 % 1Y/2N/9A
Radiation Therapy: After Mastectomy

Following mastectomy, radiation if given should include: We do not clearly know yet!

1. Chest wall only 11.4%
2. Chest wall and regional nodes but not IMN 40.9%
3. Chest wall and regional nodes including IMN 15.9 %
9. Abstain 31.8%
Radiation Therapy: After Mastectomy

If RT is given following immediate breast reconstruction, it should include:

- **Regional lymph nodes only**: 13.3/62.2/24.4 1Y/2N/9A
- **Nodes and the reconstructed breast**:
  - **In most cases**: 54.8/28.6/16.7 1Y/2N/9A
  - **Only with adverse pathological features**: 37.5/42.5/20% 1Y/2N/9A
Radiation Following Neo-Adjuvant Chemotherapy

Approach to RT after neo-adjuvant therapy:

• Should follow the stage *before* neo-adjuvant therapy? 68.3/22/9.8 1Y/2N/9A

• Should follow the stage *after* neo-adjuvant therapy? 24.4/65.9/9.8 1Y/2N/9A
Pathology

Distinction between ‘Luminal A-like’ and ‘Luminal B-like’ (HER2 neg.) can be:

- Derived from ER, PR and Ki-67? 78/22/0  1Y/2N/9A
- Ki-67 use requires knowledge of local lab values 70.3/13.5/13.5  1Y/2N/9A

If used, the minimum value of Ki-67 required for ‘Luminal B-like’ is
1. 1 – 13 % 2.3%
2. 14 – 19 % 13.6%
3. 20 – 29 % 36.4%
4. 30 % or more 6.8%
5. Ki-67 should not be used for this distinction 20.5%
6. Abstain 2.3%

- Only appropriately determined by multi-gene classifiers such as PAM50 or MammaPrint®/BluePrint®? 30.6/66.7/2.8  1Y/2N/9A

Subtype need not be determined since it can be replaced by risk scores derived from multi-gene tests 26.2/59.5/14.3% 1Y/2N/9A
Extra question

• The decision for adjuvant chemotherapy in a patient with ER+/HER2- Node neg breast cancer of > 1 cm always requires ki67 or multi-gene assays

• Yes 55.6%
• No 44.4%
• Abstain 0
Pathology

Should the extent of lymphocytic infiltration be reported and used as:

- A prognostic marker in TNBC and HER2 positive disease? 25.6/69.8/4.7 1Y/2N/9A
- A predictive marker for therapy benefit in TNBC and HER2 positive disease? 7.7/89.7/2.6 1Y/2N/9A
Multi-Gene Signatures

In a valuable addition, an endocrine-responsive cohort with high endocrine receptor levels ± Ki-67 and ve HER2, clinically additional information on **prognosis** and **indication for chemotherapy** is provided by:

- **Oncotype DX® RS**
  - Prognosis: years 1-5? 82.9 Y/14.6 N/2.4 A, beyond 5 yrs? 43.9/51.2/5 1Y/2N/9A
  - Chemotherapy? 80.5/14.6/5 1Y/2N/9A

- **MammaPrint 70®**
  - Prognosis: years 1-5? /891.5/10 1Y/2N/9A, beyond 5 yrs? 19/66.7/14 1Y/2N/9A
  - Chemotherapy? 35/47.5/17.5 1Y/2N/9A

- **PAM-50 ROR score**
  - Prognosis: years 1-5? 92.9/0/7.1 1Y/2N/9A, beyond 5 yrs? 63.2/18.4/18.4 1Y/2N/9A
  - Chemotherapy? 38.2/47.1/14.7 1Y/2N/9A

- **EndoPredict®**
  - Prognosis: years 1-5? 70.3/20.8/18 1Y/2N/9A, beyond 5 yrs? 38.2/38.2/23.5 1Y/2N/9A
  - Chemotherapy? 23.5/52.9/23.5 1Y/2N/9A

- **Breast Cancer Index**
  - Prognosis: years 1-5? 58.3/8/33 1Y/2N/9A, beyond 5 yrs? 30.6/30.6/38.1 1Y/2N/9A
  - Chemotherapy? 10/50/36.7 1Y/2N/9A
Endocrine Therapy

Premenopausal: ‘Typical’ Cases

Age 42, node negative, grade 2, T1, no chemotherapy:
1. Tam alone 85%
2. OFS plus Tam 12.5%
3. OFS plus AI 0
4. None of the above 2.5%
9. Abstain 0

Age 34, node positive, grade 3, T1, remaining premenopausal after adjuvant chemotherapy:
1. Tam alone 2.3%
2. OFS plus Tam 23.3%
3. OFS plus exemestane 69.8%
4. None of the above 2.3%
9. Abstain 2.3%
Endocrine Therapy

Premenopausal: Selection Factors

Factors arguing for including ovarian function suppression (OFS) are:

• Age <= 35 years 81%/19%/0 1Y/2N/9A
• Premenopausal oestrogen level after adjuvant chemotherapy 73.7/26.3/0 1Y/2N/9A
• Grade 3 55.9/38.2/0 1Y/2N/9A
• Involvement of 4 or more nodes 89.7/10.3/0 1Y/2N/9A
• Adverse result of multi-gene test 60/24.4/15.6% 1Y/2N/9A
Factors arguing for use of OFS + AI rather than OFS + tamoxifen are:

- Age $\leq 35$ years 59.4/37.5/3.1 1Y/2N/9A
- Premenopausal oestrogen level after adjuvant chemotherapy 43.9/51.2/4.9 1Y/2N/9A
- Grade 3 57.1/35.7/7.1 1Y/2N/9A
- Involvement of 4 or more nodes 92.5/5/2.5% 1Y/2N/9A
- Adverse result of multi-gene test 65.8/31.6/2.6% 1Y/2N/9A
Extra question

• If you decide to give OFS, overall you’re more likely to recommend Tam or AI?
  • Tamoxifen 36.6%
  • AI 58.5%
  • Abstain 4.9%
Endocrine Therapy
Postmenopausal

Can some patients be adequately treated with tamoxifen alone? 97.6/2.4/0 1Y/2N/9A

Factors arguing for inclusion of an AI at some point are:

• Age < 60 31/69/0 1Y/2N/9A
• Involvement of 4 or more nodes 97.6/2.4/0 1Y/2N/9A
• Grade 3 or high Ki-67 97.7/2.3/0 1Y/2N/9A
• HER2 positivity 71.1/28.9/0 1Y/2N/9A

If an AI is used, should it be started upfront:

• In all patients? 47.5/52.5/0 1Y/2N/9A
• In patients at higher risk? 95.5/4.5/0 1Y/2N/9A

Can upfront AI be switched to TAM after 2 yrs? 75/22.5/2.5 1Y/2N/9A
Endocrine Therapy
Duration

After 5 years of adjuvant Tam, continued AI, AI/OS or Tam to 10 years should be recommended to:

• Premenopausal patients with node-positive disease? 100/0/0
• Premenopausal patients with node-negative disease? 15.4/74.4/10.3
• Premenopausal patients with grade 3 or high Ki-67? 73.8/21.4/4.8
• Postmenopausal patients with node-positive disease? 95.2/4.8/0
• Postmenopausal patients with node-negative disease? 14.6/80.5/4.7
• Postmenopausal patients with grade 3 or high Ki-67? 76.7/18.6/4.7
• Postmenopausal patients, premenopausal at baseline? 66.7/25.6/7.2
Endocrine Therapy

Duration

Provided an indication exists for therapy beyond the first 5 years:

After 5 years of adjuvant therapy involving **switch from Tam to an AI** (therefore assuming postmenopausal status at the 5 year time point and reasonable tolerance to endocrine therapy), patients should be recommended to receive:

- A further 5 years of tamoxifen 39.4/57.6/3 1Y/2N/9A
- Continue AI to a cumulative total of 5 years AI 75/22.5/2.5 1Y/2N/9A
- A further 5 years AI 31.4/60/8.6 1Y/2N/9A
- No further endocrine therapy 13.9/83.3/2.8

After 5 years of **straight AI** adjuvant therapy, patients should be recommended to receive:

- A further 3 to 5 years of tamoxifen 34.1/63.4/2.4 1Y/2N/9A
- A further 3 to 5 years AI 42.9/57.1/0 1Y/2N/9A
- No further endocrine therapy 40.9/54.5/4.5 1Y/2N/9A
Extra question

• After 5 years of adjuvant therapy involving tamoxifen x 2 years followed by AI x 3 years (assuming postmenopausal status and tolerance of hormonal therapy), the preferred treatment is: Needs clarification!

• 5 more years of tamoxifen 3.2%
• Continue AI to a total of 5 years 54.8%
• Continue AI for 5 full years 16.1%
• No further treatment 16.1%
• Abstain 9.7
Extra question

After 5 years of straight AI: **We do not (yet) know!**

- 3-5 years of tam 27%
- 3-5 years of AI 37.8%
- No further endocrine treatment 29.7%
- Abstain 5.4%
Extra question

Optimal duration of OFS: we do not know, yet!

- 2-3 years 16.7%
- 5 years 56.7%
- Lifelong 3.3%
- Abstain 23.3%
Chemotherapy

Factors which are *relative* indications for the inclusion of adjuvant cytotoxic chemotherapy include:

- Histological grade 3 tumor 97.4/2.6/0
- Any positive node 38.7/61.3/0
- 4 or more positive node 95.1/4.9/0
- Ki-67 high 75/8.3/16.7
- Age < 35 41.7/58.3/0
- Extensive lympho-vascular invasion 67.6/32/0
- Low hormone receptor staining 81.1/18.9/0
Chemotherapy
Luminal A

Is Luminal A phenotype less responsive to chemotherapy?
88/4.1/7.8  1Y/ 2N/ 9A

Should chemotherapy be added for high risk (based on T-size, Node neg)? 36.4/63.6/0 1Y/ 2N/ 9A

If so, the minimum T-size to recommend chemotherapy is:
1. 1 cm  2.6%
2. 2-5 cm  10.5%
3. > 5 cm  23.7%
9. Abstain (e.g. if you voted NO to the previous question) 63.2%
Chemotherapy
Luminal A

Should chemotherapy be added for high risk (based on LVI)?
28.6%/66.7/4.8  1Y/ 2N/ 9A

Should chemotherapy be added for high risk (based on 1 – 3 nodes involved)? 34.9/65.1/0  1Y/ 2N/ 9A

Should chemotherapy be added for high risk (based on 4 or more nodes involved)? 91.1/6.7/2.2  1Y/ 2N/ 9A
Chemotherapy
Luminal B (HER2 negative)

In **IHC Luminal B-like** tumors chemotherapy should be recommended in:

- All patients 22/78/0 1Y/2N/9A
- Only in patients with other indicators of increased risk 87.5/7.5/5 1Y/2N/9A

Chemotherapy may be **omitted** for patients with luminal B-like disease and:

- Low Oncotype Dx® score 94.9/0/5.1
- Intermediate Oncotype Dx® score 36.4/43.2/20.5
- MammaPrint® Low Risk 72.1/16.3/11.6
- Low PAM50 ROR score 82.5/7.5/10
- EndoPredict® Low Risk 69.6/10.9/17.4
Chemotherapy
Luminal B (HER2 negative)

If given, should the regimen contain anthracyclines?
83.3/13.9/2.8

If given, should the regimen contain taxanes?
76.9/20.5/2.6

Should chemotherapy ever comprise 6 cycles of the same therapy (e.g., 6 courses of FEC or AC)?
21.6/75.7/2.7

Is there a high risk group for which dose-dense therapy with G-CSF should be preferred?
57.1/40/2.9
Chemotherapy

TNBC Ductal

Should the regimen for TNBC phenotype contain anthracyclines and taxanes?

92.3/2.6/5.1

Should a platinum based regimen be considered?

- In all patients with TNBC? 7.1/92.9/0
- *Only* when known BRCA mutation? 57.9/36.8/5.3

Should dose-dense ChT requiring growth factor support be preferred?

45/52.5/2.5

Is anthracyclines followed by taxanes an acceptable regimen for BRCA mut TNBC?

Yes 77.8%, no 11.1%, abstain 11.1%
Chemotherapy
HER2-positive Stage 2

Should chemotherapy always be given to patients with stage 2 disease who require anti-HER2 therapy? 97/3/0

Should the chemotherapy regimen for these patients preferably contain anthracyclines? 88.9/7.4/3.7 1Y/2N/9A

Should the chemotherapy regimen for these patients contain taxanes? 97.2/2.8/0 1Y/2N/9A

Should anti-HER2 therapy start concurrent with taxane? 97.3/2.7/0 1Y/2N/9A
Chemotherapy
HER2-positive

Assuming HER2 positivity is determined according to ASCO/CAP guidelines:

• Do the large majority of patients with HER2 positive \textit{stage 1} disease require anti-HER2 therapy:
  – with T1a disease? 20.7/\textbf{79.3}/0
  – with T1b disease? \textbf{81.4}/18.6/0
  – with T1c disease? \textbf{100}/0/0

• If given, should the chemotherapy regimen for these patients contain anthracyclines? 57.9/42.1/0

• If given \textit{in stage I}, is the combination of paclitaxel and trastuzumab a reasonable option? \textbf{86.5}/2.7/10.8
Any patient with HER2+ Stage I BC and candidate to chemo with a tumor of maximum 1 cm. Preferred regimen:

- anthracyclines followed by taxanes and trastuzumab 27%
- Paclitaxel-trastuzumab 64.9%
- Other 8.1%
- Abstain 0
Any patient with HER2+ Stage I BC and candidate to chemo with a tumor >1 cm. Preferred regimen:

- anthracyclines followed by taxanes and trastuzumab 50%
- Paclitaxel-trastuzumab 37.5%
- Other 9.4%
- Abstain 0
Anti-HER2 Therapy
Which Agents?

(These questions assume the availability of the relevant agents)

In patients requiring anti-HER2 therapy in the postoperative adjuvant setting for a T2 tumor with 4 involved nodes:

• Therapy should include both trastuzumab and pertuzumab

  $21.4/78.6/0$  

• Therapy should include both trastuzumab and lapatinib

  $8/92/0$  

  $2N/9A$
Neo-Adjuvant Systemic Therapy
(possibly followed by additional adjuvant chemo)
Stage II HER2-positive Disease

In HER2-positive tumors, are the following acceptable regimens?

- Taxane + trastuzumab only 46.7/46.7/6
- Taxane, trastuzumab and pertuzumab 73.1/19.2/7.7
- Platin, taxane, trastuzumab ± pertuzumab 39.3/53.6/3.6
- Non-taxane regimen containing platin, trastuzumab ± pertuzumab 2.9/91.2/5.9
- Anthracycline -> taxane and anti-HER2 97.2/2.8/0
Neo-Adjuvant Systemic Therapy (possibly followed by additional adjuvant chemo)

Stage II HER2-positive Disease

In HER2-positive tumors, which is the preferred regimen? We do not yet clearly know!

- Taxane + trastuzumab only 7.7%
- Taxane, trastuzumab and pertuzumab 23.1%
- Platin, taxane, trastuzumab ± pertuzumab 12.8%
- Non-taxane regimen containing platin, trastuzumab ± pertuzumab 0%
- Anthracycline -> taxane and anti-HER2 56.4%
Neo-Adjuvant Systemic Therapy
Stage II Triple-Negative Disease

If given, in patients with *triple-negative* tumors, the preferred regimen should include:

- High-dose alkylating agent: 17.2/79.3/3.4
- Platin: 25/75/0
- Anthracycline $\rightarrow$ taxane: 94.7/2.6/2.6
- Nab-paclitaxel $\rightarrow$ EC: 22.9/71.4/5.7
- Anthracycline $\rightarrow$ regimen with alkylating agents (e.g. classical CMF): 25.7/65.7/8.6
Neo-Adjuvant Systemic Therapy: Chemotherapy in Luminal Disease

Neoadjuvant cytotoxic therapy should be discussed as an option and often given in patients with ‘Luminal A-like’ tumors:

1. In the majority of cases 2.9%
2. Only if conservative surgery would not otherwise be feasible 73.5%
3. Never 20.6%
9. Abstain 2.9%

...and in patients with ‘Luminal B-like’ tumors (HER2 neg.) We do not know yet

1. In the majority of cases 37.8%
2. Only if conservative surgery would not otherwise be feasible 45.9
3. Only if biological features predict high chance of pCR 16.2
4. Never 0
9. Abstain 0
Is neoadjuvant endocrine therapy without cytotoxics a reasonable option for postmenopausal patients with endocrine responsive disease? 87.9/12.1/0

If yes, for which duration?

1. 1 – 2 weeks “window” prior to surgery 71%
2. 3 – 4 months 3.6%
3. 4 – 8 months 42.9%
4. Until maximal response 42.9%
9. Abstain 3.6%
Bisphosphonates

Is bisphosphonate treatment, such as zoledronic acid q 6 months or oral clodronate, during adjuvant endocrine therapy indicated to improve DFS?

- In premenopausal patients receiving LHRH plus TAM?
  \[43.6\% / 56.4\% / 0\]

- In premenopausal patients not receiving LHRH?
  \[5.3\% / 94.7\% / 0\]

- In postmenopausal patients?
  \[58.3\% / 41.7\% / 0\]

Should adjuvant denosumab substitute for bisphosphonate?

\[3.7\% / 88.9\% / 7.4\%\]
Elderly Patients

In the absence of significant co-morbidity the **maximum** age at which a standard chemotherapy regimen should be advised is:

1. 55 yrs  2.6%
2. 65 yrs  0
3. 70 yrs  2.6%
4. 75 yrs  0
5. 80 yrs  7.7%
6. There is no absolute age limit. Rather, it depends on the disease, the presence of co-morbidity, the life expectancy, and the patient’s preferences 87.2%
9. Abstain  0
Elderly Patients: Radiation

In postmenopausal patients with ER-positive tumors receiving endocrine therapy, radiation after breast conserving surgery can be **omitted** in patients aged over:

1. 55 yrs  0
2. 65 yrs  5.6%
3. 70 yrs  27.8%
4. 75 yrs  8.3%
5. 80 yrs  0
6. There is no age at which radiation should be omitted. Rather, it depends on the disease, the presence of co-morbidity, the life expectancy, and the patient’s preferences 55.6% ????
9. Abstain  2.8%
Young Patients

Testing for BRCA 1 and 2 mutations is indicated in women < 40 y 73.5%/23.5%/0

Testing for high risk mutations in other genes (e.g. PALB2) is indicated 41.2/50/8.8

Fertility preservation (e.g. by ovarian tissue or oocyte conservation) should be offered to women < 40 y 87.5/10/2.5

Ovarian function suppression during chemotherapy for receptor-negative disease should be offered 78.9/18.4/2.6
Extra question

• Is a BRCA test indicated in women < 40 y with TNBC? Yes 90.9%, no 6.1%, abstain 3%

• Is a BRCA test indicated in women < 60 y with TNBC? Yes 48.5%, no 48.5%, abstain 3%
High Risk Mutations

Testing for high risk mutations is indicated in:

- All women with breast cancer 11.1/88.9/0
- Patients with a strong family history 94.3/5.7/0
- Patients under 35 at diagnosis 88.9/7.4/4
- Patients under 50 at diagnosis 7.4/92.6/0
- Patients under 50 with ER and HER negative tumors 70/30/0
- Patients with ER and HER2 negative tumors 25.7/71.4/2.9
- Patients with a basal-like tumor 48.6/45.7/5.7

Discovery of a BRCA 1 or 2 mutation influences treatment of the tumor (answers in the next slide) 1Y/2N/9A
Extra- Discovery of a BRCA 1 or 2 mutation influences treatment of the tumor

- Locoregional: yes 77.8, no 22.2, 0
- Neoadjuvant: yes 65.6, no 34.4, abstain 0
- Adjuvant: Y 28.9, N 65.8, A 5.3%
Breast Cancer Diagnosed During Pregnancy

- Premature delivery should be avoided if possible \(88.9/3.7/7.4\)
- Breast conservation is a suitable option \(89.5/2.6/7.9\)
- Lymphoscintigraphy and SNB are safe \(64.5/29/6.5\)
- Immediate post-mastectomy reconstruction is an appropriate option \(52.6/38.6/10.5\)
- If indicated, anti-HER2 therapy should be delayed until after delivery \(87.2/7.7/5.1\)
Pregnancy After Breast Cancer

Is it reasonable to interrupt endocrine therapy to allow attempted pregnancy:

• At any time during endocrine therapy? 26.3%/68.4%/5.3%
• After 18 – 30 months endocrine therapy? 60.6%/30.3%/9.1%
• Only in absence of high risk factors? 61.1%/27.8%/11.1%
Extra question

Preferred treatment in a 55 year old woman with ER+PR+ Luminal A-like breast cancer not suitable for breast conserving surgery at diagnosis:

- Endocrine therapy 83.8%
- Chemotherapy 16.2%
Male Breast Cancer

Most breast cancers in males are endocrine responsive. Tamoxifen is currently advised. Adjuvant therapy options beyond tamoxifen include:

- Aromatase inhibitors alone  29 Y/ 58.1 N/ 12.9 A
- Aromatase inhibitors + LHRH a  29.6Y/ 66.7 N/ 3.7 A
- Complete estrogen blockade  not answered  1Y/ 2N/ 9A  No data!
- No answer, as suggested by Fatima
Diet and Exercise after BC to reduce the risk of recurrence

• Should patients receive specific dietary advice? 40/57.5/2.5
• Should patients with vitamin D deficiency receive vitamin D supplement? 57.1/34.3/8.6
• Should an exercise regimen be part of standard care? 76.7/23.3/0
• Should weight loss / avoidance of weight gain be recommended? 87.5/7.5/5.5
THANK YOU