Genitourinary Masterclass

Workshops
Care for patients with advanced prostate cancer: Adding life to years
Fatigue

Professor Antonio Alcaraz

Professor Stéphane Oudard

Prescribing information is available at the end of this presentation.
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Xtandi™ enzalutamide

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XTANDI™ (enzalutamide) indications

XTANDI is indicated, as per the EMA SmPC:

- As monotherapy or in combination with ADT for the treatment of adult men with high-risk biochemical recurrent nmHSPC who are unsuitable for salvage radiotherapy
- In combination with ADT for the treatment of adult men with mHSPC
- For the treatment of adult men with high-risk nmCRPC
- For the treatment of adult men with mCRPC who are asymptomatic or mildly symptomatic after failure of ADT and in whom chemotherapy is not yet clinically indicated
- For the treatment of adult men with mCRPC whose disease has progressed on or after docetaxel therapy

XTANDI is subject to medicinal prescription.
Astellas Pharma B.V., Sylviusweg 62, 2333 BE Leiden, The Netherlands.
ADT, androgen deprivation therapy; EMA, European Medicines Agency; mCRPC, metastatic castration-resistant prostate cancer; mHSPC, metastatic hormone-sensitive prostate cancer; nmCRPC, nonmetastatic castration-resistant prostate cancer; nmHSPC, nonmetastatic hormone-sensitive prostate cancer; SmPC, Summary of Product Characteristics.
XTANDI (enzalutamide). Summary of Product Characteristics.

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Managing fatigue in prostate cancer patients treated with ARPIs

Professor Antonio Alcaraz

Chair Department of Urology – Hospital Clinic Barcelona
Professor of Urology – University of Barcelona

ARPI, androgen receptor pathway inhibitor.

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Disclosures

Professor Alcaraz has acted as a speaker for the following companies:

- Astellas, Bayer, Casen Recordati, Ipsen, Janssen and Olympus
- The speaker has received an honorarium for this presentation

ADT + ARPI: Standard of care

DOUBLET THERAPY

Trial	Experimental arm	Control arm	Number of enrolled patients (experimental vs. control)	Population characteristics	Median follow-up (months)	OS		
						Experimental	Control	HR (95% CI);p
LATITUDE[1]	Abiraterone + prednisone + ADT	ADT + placebo	1,199 (597 vs. 602)	Newly diagnosed mHSPC ≥2 of the following high-risk factors: Gleason score ≥8, ≥3 bone lesions, and measurable visceral metastasis	51.8	53.3 months	36.5 months	**0.66** (0.56–0.78); p<0.0001
STAMPEDE[2]	Abiraterone + prednisolone + ADT	ADT	1,917 (960 vs. 957)	Newly diagnosed metastatic, node-positive, or high-risk locally advanced (N0M0, ≥2 of the following: T3 or T4, Gleason score 8–10, and PSA ≥40 ng/mL), or recurrent disease after local therapy with high-risk features or metastasis	40.0	-	-	**0.61** (0.49–0.75); p<0.001
TITAN[3]	Apalutamide + ADT	ADT + placebo	1,052 (525 vs. 527)	Prior docetaxel or ADT were allowed	44.0	NR	52.2 months	**0.65** (0.53–0.79); p<0.0001
ENZAMET[4]	Enzalutamide + testosterone suppression	Testosterone suppression + standard nonsteroidal antiandrogen therapy	1,125 (563 vs. 562)	Testosterone suppression initiated up to 12 weeks before randomization; administration of docetaxel was allowed	68.0	OS at 5 years: 67%	OS at 5 years: 57%	**0.70** (0.58–0.84); p<0.0001
ARCHES[5]	Enzalutamide + ADT	ADT + placebo	1,150 (574 vs. 576)	Prior docetaxel or ADT were allowed	44.6	NR	NR	**0.66** (0.53–0.81); p<0.001
ARANOTE[6-8]	Darolutamide + ADT	ADT + placebo	669 (446 vs. 223)	Can have started ADT up to 12 weeks before randomisation	-	NR	NR	**0.78** (0.58–1.05); p=NS

Data shown are for illustrative purposes only, and direct comparisons should not be drawn.

ADT, androgen-deprivation therapy; CI, confidence interval; HR, hazard ratio; mHSPC, metastatic hormone-sensitive prostate cancer; NR, not reached; NS, not significant; OS, overall survival;

1. Fizazi K, et al. *Lancet Oncol* 2019;20:686–700; 2. James ND, et al. *N Engl J Med* 2017;377:338–351; 3. Chi KN, et al. *J Clin Oncol* 2021;39:2294–2303; 4. Sweeney CJ, et al. *Lancet Oncol* 2023;24: 323–34; 5. Armstrong AJ, et al. *J Clin Oncol* 2022;40:1616–1622; 6. Saad F, et al. J Clin Oncol 2024;42:4271–4281; 7. NUBEQA (darolutamide) Summary of Product Characteristics; 8. US FDA. FDA approves darolutamide for metastatic castration-sensitive prostate cancer [Website[. Available at: https://www.fda.gov/drugs/resources-information-approved-drugs/fda-approves-darolutamide-metastatic-castration-sensitive-prostate-cancer#:~:text=sensitive%20prostate%20cancer-,FDA%20approves%20darolutamide%20for%20metastatic%20castration%2Dsensitive%20prostate%20cancer,Efficacy%20and%20Safety. Last accessed: June 2025.

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Fatigue in prostate cancer: Scope of a problem

- Baseline fatigue rates from clinical trials in advanced prostate cancer (mHSPC or mCRPC): >50% of patients with experience fatigue before starting treatment with ADT + ARPI[1]
- Prevalence of fatigue in patients on ARPIs: 14–85%[2–6]
- Impacts:[7]
  - Quality of life (HRQoL)
  - Treatment adherence
  - Psychosocial well-being

Possible mechanisms of fatigue[8-11]

- CNS penetration (based on preclinical *in vivo* studies: higher with enzalutamide and apalutamide vs. darolutamide)
- Steroid-related metabolic changes (e.g. abiraterone + prednisolone)
- Muscle loss and sarcopenia
- Inflammatory cytokines and hormonal milieu

ARPI, androgen receptor pathway inhibitor; CNS, central nervous system; HRQoL, health-related quality-of life.

1. Tombal B, et al. *Prostate Cancer Prostatic Dis* 2022;25:288–295; 2. Fizazi K, et al. *Lancet Oncol* 2019;20:686–700; 3. James ND, et al. *N Engl J Med* 2017;377:338–351 (supp); 4. Chi KN, et al. *J Clin Oncol* 2021;39:2294–2303 (supplementary appendix); 5. Sweeney CJ, et al. *Lancet Oncol* 2023;24: 323–34; 6. Armstrong AJ, et al. *J Clin Oncol* 2022;40:1616–1622; 7. Speaker's own experience; 8. Zurth C, et al. *J Clin Oncol*. 2019;37(suppl 7):156; 9. Ferro M, et al. *World J Urol* 2019;37:1049–1059; 10. Fischer S, et al. *Cancer Treatment Res Comm* 2020;25:100256; 11. Bower JE. *Nat Rev Clin* Oncol 2014;11:597–609.

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Comparative fatigue profiles

Drug	Relative risk of all-grade fatigue vs. SOC (95% CI)[1]	CNS penetration (based on a preclinical *in vivo* study)*[2]
Enzalutamide	1.46 (1.30-1.64)	Moderate
Apalutamide	1.30 (1.03-1.65)	Moderate
Abiraterone	1.15 (1.03-1.29)	-
Darolutamide	1.59 (1.06-2.39)	Low

Data shown are for illustrative purposes only, and direct comparisons should not be drawn.

*This preclinical study used the same dose for each agent tested and does not account for differences in the approved dose for human use.

CNS, central nervous system.

1. Matsukawa A, et al. *Clin Genitour Cancer* 2025;23:102251; 2. Zurth C, et al. *J Clin Oncol*. 2019;37(suppl 7):156.

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Real-world prevalence of adverse events with first-line systemic therapies among patients with mHSPC

Proportion of patients with AEs* at months 3 and 12 by index-treatment cohorts—IPTW sample

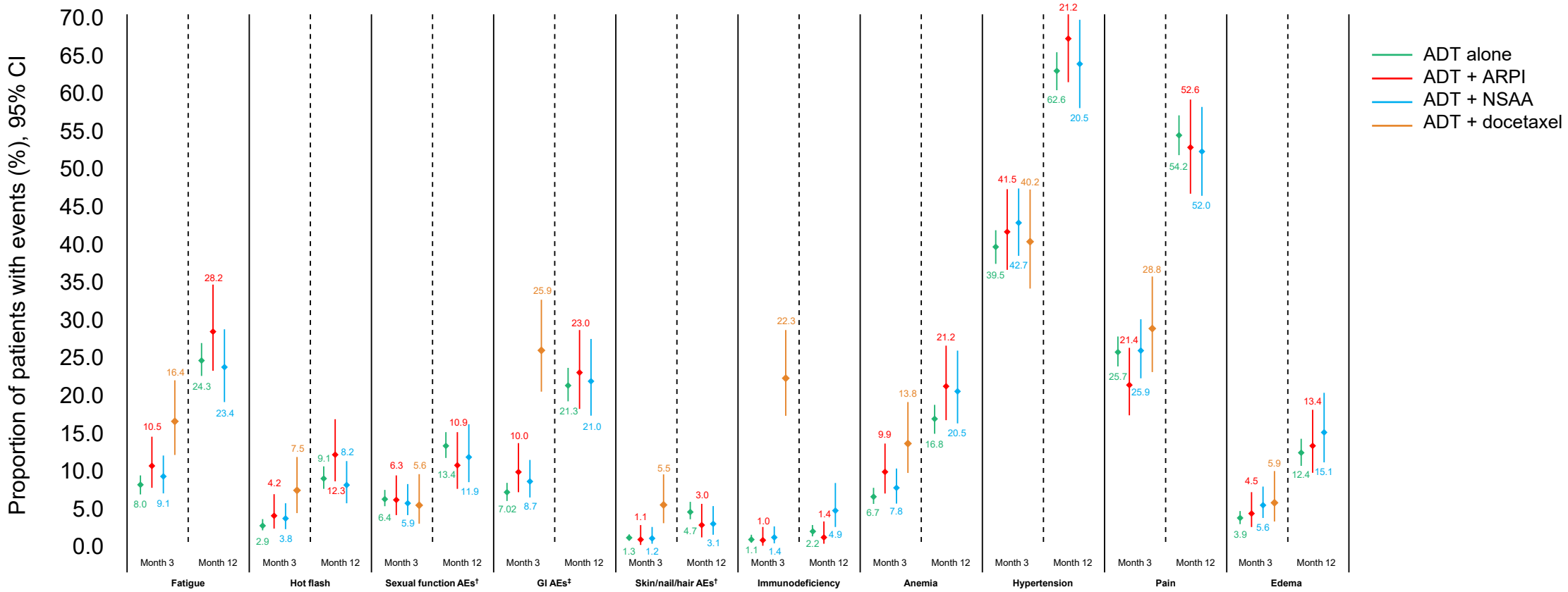

Figure adapted from Swami U, et al., 2024.
*AEs are not mutually exclusive within each treatment group. †Erectile/sexual dysfunction, decreased erections, impotence, decreased/loss of libido, and testicular atrophy. ‡Constipation, diarrhoea, GI disorder, and nausea.
ADT, androgen deprivation therapy; AE, adverse event; ARPI, androgen receptor pathway inhibitor; CI, confidence interval; IPTW, inverse probability of treatment weighting, mHSPC, metastatic hormone-sensitive prostate cancer; NSAA, non-steroidal anti-androgen..
Swami U, et al. *Prostate* 2024;84:1387–1397.
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Management strategies

Non-pharmacological

- **Exercise** (supervised aerobic + resistance training)
- **CBT**
- **Sleep hygiene**
- **Nutritional support**
- Patient education & expectation management

Pharmacological

- **Dose interruption or reduction** (case-by-case)
- **Methylphenidate or modafinil** (select cases)*
- Consider **switching ARPI** if fatigue is not resolved by dose reduction or other intervention

Images freely available in PowerPoint.
*Please refer to SmPC for these products for full information.
CBT, Cognitive Behavioural Therapy; CNS, central nervous system.
Speaker's own experience.
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Non-pharmaceutical strategies

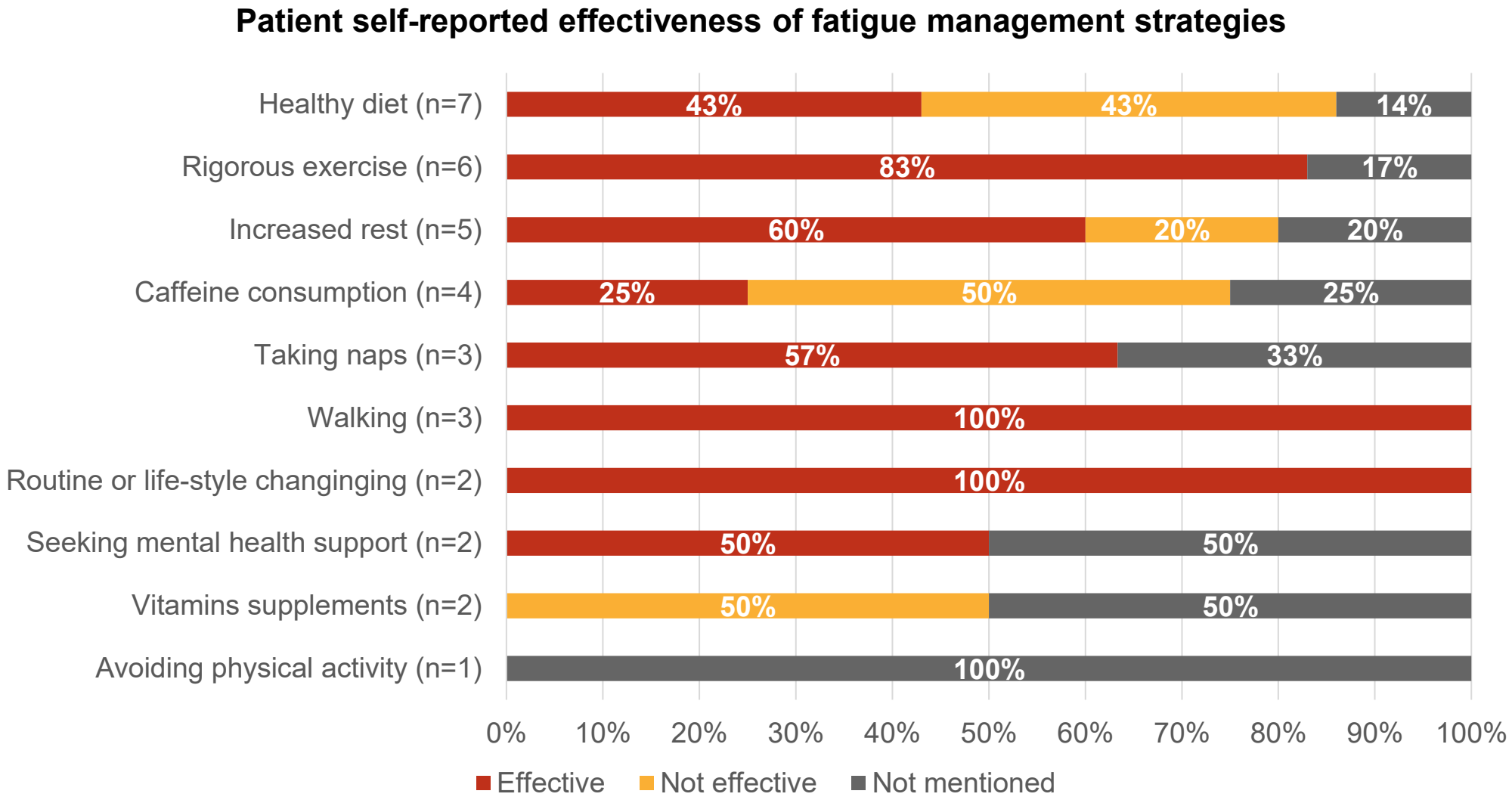

Figure adapted from Freedland SJ, et al., 2023.
Freedland SJ, et al. Presented at ASCO GU 2023, February 16–18 2023, San Francisco, CA, USA:Abstract 100.

Dose disruption or reduction

Enzalutamide efficacy and toxicity findings[1,2]

Study	Summary of methods	Efficacy findings	Toxicity findings
Scher et al., 2010	Phase I–II trial evaluating doses between 30 and 600 mg/day* to determine maximum tolerated dose and antitumor effects in patients with mCRPC	PSA reduction ≥50% in 56% of patients. Median time to radiological progression: 47 weeks	Grade 3–4 fatigue: 11% (dose-dependent). Resolved after dose reduction
Terada et al., 2016	Retrospective cohort study comparing patients on standard dose (160 mg/day) vs. reduced dose (<160 mg/day) in patients with mCRPC	PSA reduction ≥50% in 57% of patients. Median PSA progression-free survival: 163 days	AEs (fatigue, appetite loss): 49% Discontinuation due to AEs: 18% Older age and lower doses are associated with fewer AEs
Hori et al., 2020	Real-world study comparing efficacy and safety in CRPC patients on doses ranging from 80 to 160 mg/day	PSA decrement ≥50% in 92% of patients	AEs were mild (>20%) No significant safety concerns in Japanese CRPC patients
Vinh-Hung et al., 2020	Retrospective study comparing patients with mCRPC on standard dose (160 mg/day) and low dose (<80 mg/day)	PSA reduction ≥50% in 67% (low dose) vs. 45% (standard dose). Median PFS: 11.2 months (low dose) vs. 11.9 months (standard dose)	Low-dose is associated with reduced toxicity in elderly, poor-performance patients
Miura et al., 2021	Patients with mCRPC were divided into standard-dose (160 mg/day) and dose-escalation (80 mg/day, gradually increasing to 160 mg/day) groups	Median TTF: 10.4 months (standard dose) vs. 18.0 months (dose escalation)	Grade ≥3 AEs: 23.5% (standard dose) vs. 6.7% (dose escalation). AEs (any grade): 88.2% (standard dose) vs. 63.3%. Discontinuation due to AEs: 35.3% (standard dose) vs. 12.2%
Boerrigter et al., 2024	Muticentre randomised trial comparing the standard dose (160 mg) to reduced dose (120 mg) in frail patients with mCRPC or mHSPC	A PSA response was seen in 75% of patients on the standard dose, and 78% of those on the reduced dose	Patients treated with the reduced dose had significantly lower fatigue after 24 weeks than those with the standard dose

Data shown are for illustrative purposes only, and direct comparisons should not be drawn. Table adapted from Belabaci Z, et al., 2025.

*Recommended dosing for enzalutamide per the SmPC is 160 mg/day maximum.[3]

AE, adverse event; CRPC, castration-resistant prostate cancer; PFS, progression-free survival; PSA, prostate-specific antigen; CRPC, castration-resistant prostate cancer. TTF, Time to treatment failure.

1. Belabaci Z, et al. *Pharmaceuticals (Basel)* 2025;18:732; 2. Boerrigter E, et al. *Eur Urol Oncol* 2024;7:1376–1383; 3. XTANDI (enzalutamide). Summary of Product Characteristics.

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Dose disruption or reduction

- The toxicity of ARPIs is dose-dependent
- Higher-grade fatigue observed at higher doses
- Older patients experiencing fewer AEs at reduced doses
- Freedland et al. 2021, emphasised that dose reductions below 80% relative dose intensity increased the risk of PSA progression (HR=1.258; p=0.003), highlighting the trade-off between reduced toxicity and disease control (enzalutamide)

AE, adverse event; ARPI, androgen-receptor pathway inhibitor; HR, hazard ratio; PSA, prostate specific antigen.
Belabaci Z, et al. *Pharmaceuticals (Basel)* 2025;18:732.
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Clinical case on fatigue in mHSPC

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5th July 2025

CARPEM

ASSISTANCE PUBLIQUE HÔPITAUX DE PARIS

Disclosures

Research funds:

AstraZeneca, Bayer, BMS, Ipsen, Novartis, Pfizer

Consultancy:

Astellas	Bayer	BMS	Eisai
Ipsen	Janssen	Merck	MSD
Novartis	Pfizer	Roche	Sanofi

Frail patient population: Need prevention and surveillance

Most common cancer in France

(59,885 new cases in 2018)[1]

Commonly diagnosed in patients' late 60s[2]

Heterogeneous elderly population

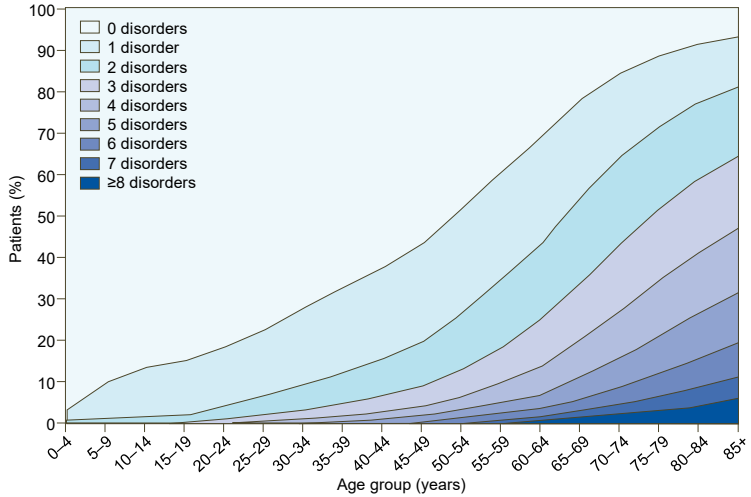
Polypathologies and comorbidities[2,3]

Polypharmacy[2]

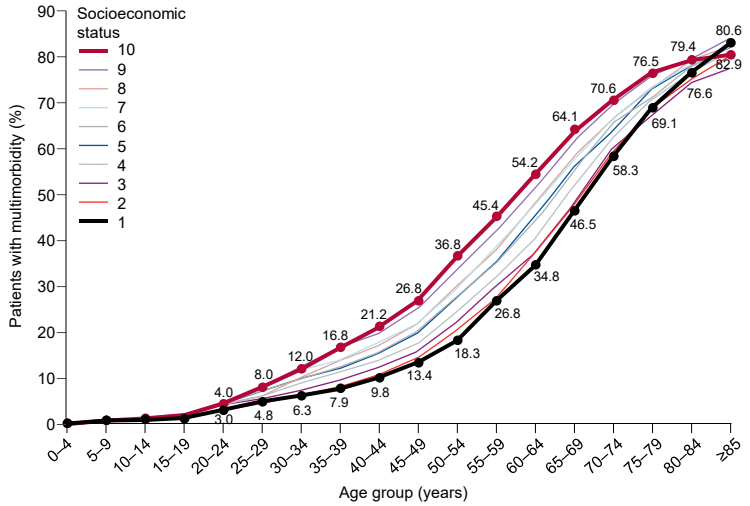
Hormonal therapy ± chemotherapy:[2]

- Insidious side effects
- Long-term exposure

Number of chronic disorders by age group[3]



Multimorbidity by age and socioeconomic status[3]



Figures adapted from Barnett K, et al. 2012.[3]

1. Ploussard G, et al. *Fr J Urol* 2024;34:102717; 2. Speaker experience; 3. Barnett K, et al. *Lancet* 2012;380:37–43.

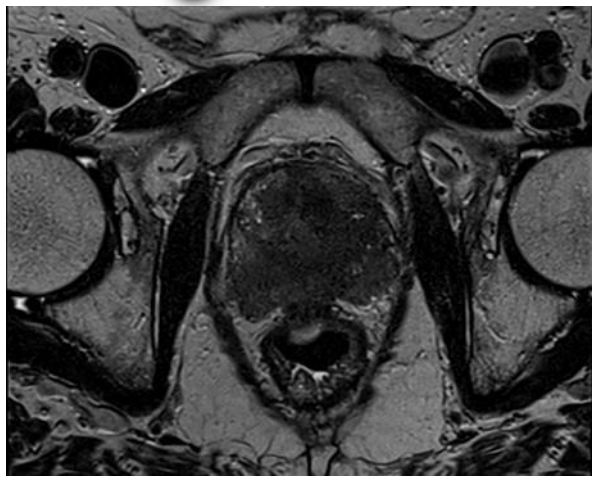
Clinical case: Mr D

72-year-old male

- Routine lab PSA: 54 ng/ml
- DRE: bilateral hard induration with extension beyond the capsula and seminal vesicle involvement (cT3b)
- **Medical history:**
  BMI: 29 kg/m^2
  HTN controlled by CNI
  Myocardial infarction (2014)
  Placement of two stents

Prostate MRI

- Bilateral lesion with capsular penetration, PI-RADS 5



Symptoms

- Mild pelvic pain, level PVA: 5/10
- Dysuria
- G8 score: 13

Prostate biopsy

- Adenocarcinoma
- Gleason score 7 (3+4)
- ISUP4

Fictitious patient case provided by the speaker. Patient image available from Microsoft PowerPoint. Clinical image provided by the speaker.
BMI, body mass index; CNI, calcineurin inhibitor; DRE, digital rectal examination; G8, geriatric screening tool; HTN, hypertension; ISUP, International Society of Urological Pathology; MRI, magnetic resonance imaging; PCa, prostate cancer; PI-RADS, Prostate Imaging–Reporting and Data System; PSA, prostate-specific antigen; PVA, percutaneous vertebral augmentation.

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- **Medical history:**
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  Myocardial infarction (2014)
  Placement of two stents

Imaging: CT

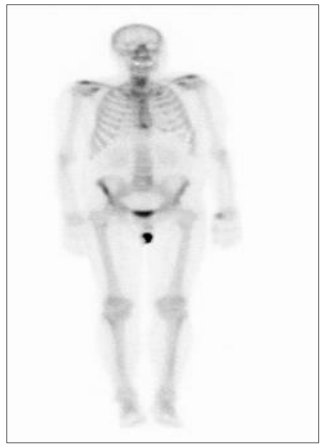
- Osteo-condensing bone lesions
- Pelvic lymph nodes
- No visceral metastases

Imaging: bone scan

- D6, D7 vertebrae
- Right acromion

Diagnosis

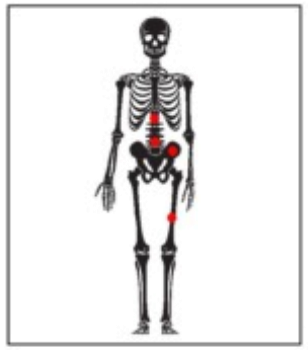
- Low-volume ***de novo*** **mHSPC**



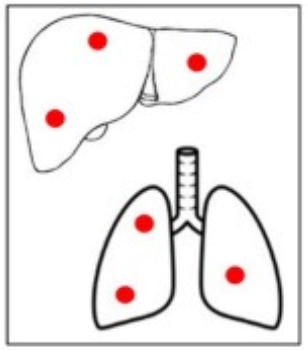
Fictitious patient case provided by the speaker. Patient image available from Microsoft PowerPoint. Clinical image provided by the speaker.
BMI, body mass index; CNI, calcineurin inhibitor; CT, computed tomography; DRE, digital rectal examination; HTN, hypertension; mHSPC, metastatic hormone-sensitive prostate cancer; PCa, prostate cancer; PSA, prostate-specific antigen.

Volume and risk of the disease (mHSPC)

CHAARTED defines **high-volume** disease as: (at least one of the following criteria)[1]

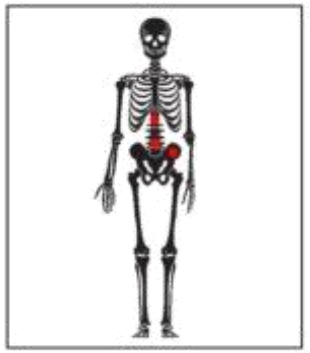


4 or more bone mets
(with at least one outside the pelvis/column)

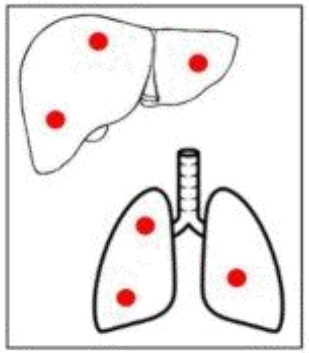


Visceral mets

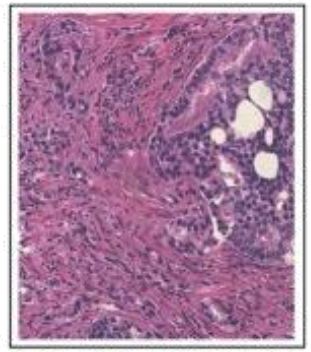
LATITUDE defines **high-risk** disease as: (at least two of the following criteria)[2]



3 or more bone mets



Visceral mets



Gleason score ≥ 8

Definition		
CHAARTED (volume)	**High**	**Visceral metastases and/or ≥4 bone metastases (≥1 other than pelvis and spine)**
LATITUDE (risk)	**High**	**≥2 risk factors:** • **≥3 bone lesions** • **Visceral metastases** • **≥ Gleason 8**

18.2% discordance between the 2 classifications[3]

Images provided by the speaker.
BMI, body mass index; CNI, calcineurin inhibitor; CT, computed tomography; DRE, digital rectal examination; HTN, hypertension; mets, metastases; mHSPC, metastatic hormone-sensitive prostate cancer; PCa, prostate cancer; PSA, prostate-specific antigen.

1. Sweeney CJ, et al. *N Engl J Med* 2015;373:737–746; 2. Fizazi K, et al. *N Engl J Med*. 2017;377:352-360; 3. Hoyle AP, et al. Presented at ESMO 2018, 19–23 October 2018, Munich, Germany. Abstract LBA4 – reported by UroToday, available at: https://www.urotoday.com/conference-highlights/esmo-2018/esmo-2018-prostate-cancer/107804-esmo-2018-effects-of-abiraterone-acetate-plus-prednisone-prednisolone-in-high-and-low-risk-metastatic-hormone-sensitive-prostate-cancer.html. Last accessed: June 2025.

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  Placement of two stents

Doublet therapy

- Initiation of LH-RH antagonist (degarelix) plus enzalutamide

Efficacy after 3 months

- Disappearance of urinary and painful symptoms
- PSA: 2.2 ng/ml (3 months)

Fictitious patient case provided by the speaker. Patient image available from Microsoft PowerPoint.
BMI, body mass index; CNI, calcineurin inhibitor; HTN, hypertension; LHRH, luteinising hormone-releasing hormone; mHSPC, metastatic hormone-sensitive prostate cancer; PCa, prostate cancer; PSA, prostate-specific antigen.

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Doublet therapy

- Initiation of LH-RH antagonist (degarelix) plus enzalutamide

Tolerability after 3 months

- No aggravation of HTN
- Asthenia grade 2

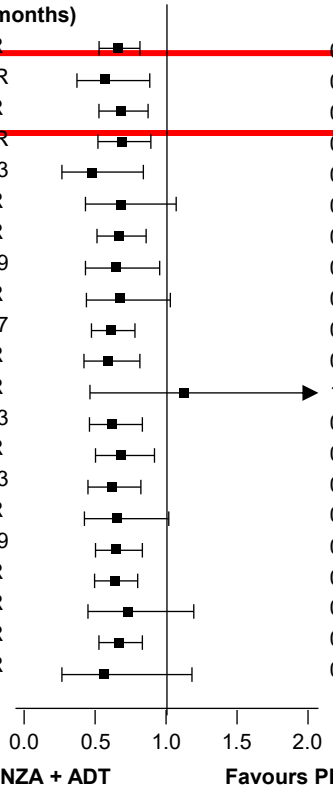
Efficacy after 3 months

- Disappearance of urinary and painful symptoms
- PSA: 2.2 ng/ml (3 months)

Fictitious patient case provided by the speaker. Patient image available from Microsoft PowerPoint.
BMI, body mass index; CNI, calcineurin inhibitor; HTN, hypertension; LHRH, luteinising hormone-releasing hormone; mHSPC, metastatic hormone-sensitive prostate cancer; PCa, prostate cancer; PSA, prostate-specific antigen.

ARCHES: Efficacy of enzalutamide + ADT in mHSPC according to subgroup of patients (overall survival)

Subgroup	ENZA + ADT No. (E)	PBO + ADT No. (E)	Median (ENZA/PBO; months)	HR (95% CI)
All subgroups	574 (154)	576 (202)	NR/NR	0.66 (0.53 to 0.81)
Age <65 years	148 (39)	152 (52)	54.2/NR	0.58 (0.38 to 0.88)
Age ≥65 years	426 (115)	424 (150)	NR/NR	0.68 (0.54 to 0.87)
Geographic region — Europe	341 (100)	344 (129)	54.2/NR	0.70 (0.54 to 0.90)
Geographic region — North America	86 (20)	77 (28)	NR/50.3	0.48 (0.27 to 0.85)
Geographic region — RoW	147 (34)	155 (45)	NR/NR	0.69 (0.44 to 1.08)
ECOG status 0 at baseline	448 (112)	443 (143)	NR/NR	0.67 (0.52 to 0.86)
ECOG status 1 at baseline	125 (42)	133 (59)	NR/45.9	0.65 (0.44 to 0.97)
Gleason score at initial diagnosis <8	171 (38)	187 (51)	NR/NR	0.68 (0.44 to 1.04)
Gleason score at initial diagnosis ≥8	386 (108)	373 (145)	NR/49.7	0.61 (0.48 to 0.79)
Disease localisation at baseline — bone only	268 (64)	245 (84)	NR/NR	0.59 (0.43 to 0.82)
Disease localisation at baseline — soft tissue only	51 (12)	45 (9)	NR/NR	1.13 (0.48 to 2.69)
Disease localisation at baseline — bone and soft tissue	217 (72)	241 (106)	NR/44.3	0.62 (0.46 to 0.84)
Baseline PSA value at or below overall median	291 (72)	303 (97)	NR/NR	0.68 (0.50 to 0.93)
Baseline PSA value above overall median	279 (82)	267 (105)	NR/48.3	0.63 (0.47 to 0.84)
Low volume of disease	220 (35)	203 (46)	NR/NR	0.66 (0.43 to 1.03)
High volume of disease	354 (119)	373 (156)	NR/45.9	0.66 (0.52 to 0.83)
No prior docetaxel therapy	471 (124)	474 (165)	NR/NR	0.64 (0.51 to 0.81)
Prior docetaxel therapy	103 (30)	102 (37)	NR/NR	0.74 (0.46 to 1.20)
Previous use of ADT or orchiectomy	535 (144)	515 (179)	NR/NR	0.67 (0.54 to 0.83)
No previous use of ADT or orchiectomy	39 (10)	61 (23)	NR/NR	0.57 (0.27 to 1.20)



The clinical benefit of enzalutamide + ADT was generally consistent across prespecified subgroups

Figure adapted from Armstrong et al., 2022.
Amstrong A, et al. *J Clin Oncol* 2022 40:1616-1622.

For elderly prostate cancer patients: Geriatric evaluation

- **Fragility assessment:** G8 score[1]
- **Geriatric assessment:** multidimensional[1]
  - Social resources
  - Functional
  - Locomotor
  - Nutritional
  - Cognitive
  - Thymic
  - Drug treatment, iatrogenics
  - Sensory functions

G8 Geriatric Screening Tool[2]

Item	Possible responses (score)
Age	>85 (0) 80–85 (+1) <80 (+2)
Has food intake declined over the past 3 months due to loss of appetite, digestive problems, chewing, or swallowing difficulties?	Severe decrease in food intake (0) Moderate decrease in food intake (+1) No decrease in food intake (+2)
Weight loss during the last 3 months, kg	>3 kg (>6.6 lb) (0) Does not know (+1) 1–3 kg (2.2–6.6 lb) (+2) No weight loss (+3)
Mobility	Bed or chair bound (0) Able to get out of bed/ chair but does not go out (+1) Goes out (+2)
Neuropsychological conditions	Severe dementia or depression (0) Mild dementia (+1) No psychological conditions (+2)
Body mass index (BMI), kg/m^2	<19 kg/m^2 (0) 19 to <21 kg/m^2 (+1) 21 to <23 kg/m^2 (+2) ≥23 kg/m^2 (+3)
Takes more than three prescription drugs per day	Yes (0) No (+1)
In comparison with other people of the same age, how does the patient consider their health status?	Not as good (0) Does not know (+1) As good (+2) Better (+3)
Total score	0–17

BMI, body mass index.

1. Bellera CA, et al. *Ann Oncol*. 2012 Aug;23(8):2166-2172; 2. MD Calc. G8 Geriatric Screening Tool [Website]. Available at: https://www.mdcalc.com/calc/10426/g8-geriatric-screening-tool . Last accessed: June 2025.

ARCHES: Tolerability of enzalutamide + ADT in mHSPC

TEAEs of special interest	ENZ + ADT (n=572)				PBO + ADT (n=574)			
	All grades		Grade 3–4		All grades		Grade 3–4	
	n, (%)	Events (rate)	n, (%)	Events (rate)	n, (%)	Events (rate)	n, (%)	Events (rate)
Convulsions	3 (0.5)	3 (0.2)	3 (0.5)	3 (0.2)	3 (0.5)	3 (0.4)	2 (0.3)	2 (0.3)
Hypertension	82 (14.3)	88 (5.8)	29 (5.1)	30 (2.0)	39 (6.8)	40 (5.5)	13 (2.3)	13 (2.8
Decreased neutrophil count	8 (1.4)	10 (0.7)	4 (0.7)	5 (0.3)	4 (0.7)	6 (0.8)	2 (0.3)	4 (0.5)
Cognitive/memory impairment	38 (6.6)	46 (3.0)	4 (0.7)	5 (0.3)	15 (2.6)	15 (2.0)	0	0
Ischaemic heart disease	26 (4.5)	31 (2.0)	7 (1.2)	8 (0.5)	11 (1.9)	14 (1.9)	8 (1.4)	9 (1.2)
Other selected cardiovascular events	25 (4.4)	33 (2.2)	10 (1.7)	11 (0.7)	10 (1.7)	11 (1.5)	4 (0.7)	5 (0.7)
Posterior reversible encephalopathy syndrome	0	0	0	0	0	0	0	0
Fatigue	184 (32.2)	216 (14.2)	16 (2.6)	26 (1.7)	118 (20.6)	126 (17.2)	11 (1.9)	12 (1.6)
Renal disorders	11 (1,9)	13 (0.9)	2 (0.3)	2 (0.1)	4 (0.7)	5 (0.7)	0	0
Second primary malignancy	22 (3.8)	23 (1.5)	15 (2.6)	16 (1.1)	11 (1.9)	14 (1.9)	7 (1.2)	7 (1.0)
Falls	58 (10.1)	86 (5.7)	7 (1.2)	10 (0.7)	19 (3.3)	20 (2.7)	3 (0.5)	4 (0.5)
Fractures	77 (13.5)	106 (7.0)	20 (3.5)	23 (1.5)	31 (5.4)	36 (4.9)	9 (1.6)	12 (1.6)
Loss of consciousness	15 (2.6)	16 (1.1)	9 (1.6)	10 (0.7)	2 (0.3)	2 (0.3)	1 (0.2)	1 (0.1)
Thrombocytopenia	3 (0.5)	7 (0.5)	0	16 (1.1)	3 (0.5)	3 (0.4)	0	0
Musculoskeletal events	223 (39.0)	395 (26.0)	14 (2.4)	1 (0.1)	170 (29.6)	257 (35.1)	17 (3.0)	20 (2.7)
Severe cutaneous adverse reactions	1 (0.2)	1 (0.1)	0	0	1 (0.2)	1 (0.1)	0	0
Angioedema	10 (1.7)	11 (0.7)	1 (0.2)	1 (0.1)	1 (0.2)	1 (0.1)	0	0
Rash	22 (3.8)	26 (1.7)	0	0	10 (1.7)	12 (1.6)	0	0
Hepatic disorder	34 (5.9)	43 (2.8)	8 (1.4)	11 (0.7)	34 (5.9)	55 (7.5)	4 (0.7)	9 (1.2)

Table adapted from Armstrong et al., 2022.
Amstrong A, et al. *J Clin Oncol* 2022 40:1616-1622.

International classification of diseases revision 10 criteria for cancer-related fatigue

Table 1	International Classification of Diseases Revision 10 Criteria for Cancer-Related Fatigue[14]
Criterium	**Description**
A	Six (or more) of the following symptoms have been present every day or nearly every day during the same 2-week period in the past month, and at least 1 of the symptoms is (A1) significant fatigue.
A1	Significant fatigue, diminished energy, or increased need to rest, disproportionate to any recent change in activity level
A2	Complaints of generalized weakness or limb heaviness
A3	Diminished concentration or attention
A4	Decreased motivation or interest to engage in usual activities
A5	Insomnia or hypersomnia
A6	Experience of sleep as unrefreshing or nonrestorative
A7	Perceived need to struggle to overcome inactivity
A8	Marked emotional reactivity (e.g., sadness, frustration, or irritability) to feeling fatigued
A9	Difficulty completing daily tasks attributed to feeling fatigued
A10	Perceived problems with short-term memory
A11	Postexertional malaise lasing several hours
B	The symptoms cause clinically significant distress or impairment in social, occupational, or other important areas of functioning
C	There is evidence from the history, physical examination, or laboratory findings that the symptoms are a consequence of cancer or cancer therapy
D	The symptoms are not primarily a consequence of comorbid psychiatric disorders such as major depression, somatisation disorder, somatoform disorder, or delirium

Table 2	Trial on Fatigue in mCRPC According to National Cancer Institute Toxicity Criteria								
Trial	**Study Arms**	**Stage**	**Patient, n**	**PS 0-1, %**	**Age**	**Hb, g/dL**	**Fatigue, %**	**G 3-4, %**	**Median OS, Months**
AFFIRM	ENZ	Post-DOC	800	91	69	12.0	34	6	18.4
	Placebo		399	92	69	12.0	29	7	13.6
COU-AA-301	ABI with PDN	Post-DOC	797	90	69	11.8	44	8	14.8
	Placebo with PDN		398	89	69	11.8	43	9	10.9
CALGB-90401	DP with BEV	MCRPC	524	96	68	12.9	NR	18	22.6
	DP with Placebo		526	95	69	12.6	NR	11	21.5
TAX 327	DOC with PDN	MCRPC	335	87	68	NR	53	5	18.9
	DOCw with PDN		334	88	69	NR	49	5	17.4
	MXN with PDN		337	86	68	NR	35	5	16.5
SPARC	STP with PDN	Second-line mCRPC	635	89	70	NR	18	1.9	14.3
	PDN		315	89	68	NR	11	1.3	14.3
ASCENT	DOC with DN101	MCRPC	477	93	70	12.5	60	11	17.8
	DOC		476	95	70	12.6	55	7	20.2
TROPIC	CBZ with PDN	Post-DOC	378	91	68	NR	37	5	15.1
	MXN with PDN		377	93	67	NR	23	3	12.7
SWOG 9916	DOC with ESM	MCRCP	338	90	70	NR	NR	NR	17.5
	MX with PDN		336	88	70	NR	NR	NR	15.6
IMPACT	SIP	Asympt mCRPC	341	100	72	12.9	39	1.2	25.8
	Placebo		171	100	70	12.7	38	1.8	21.7
Sipuleucel Trial	SIP	Asympt mCRPC	82	100	73	13.0	39	1.2	25.9
	Placebo		45	100	71	13.1	31	2.2	21.4

Fatigue Grade 3-4 was reported between 1 to 18% of patients according to treatment

Tables adapted from Colloca G, et al., 2016.

ABI, abiraterone acetate; BEV, bevacizumab; CBZ, cabazitazel, DN101, high-dose calcitriol; DOC/DP, docetaxel; ESM, estramustine; Hb, haemoglobin; MXN, mitoxantrone; OS, overall survival; PDN, prednisone; PS, performance status; SIP, sipleucel-T; STP, stereotactic prostate radiotherapy.

Fatigue and PRO end points in randomised mCRPC studies

Trial	Arms	Measures Including Fatigue Assessment
TAX 327[3]	DOC with PDN	PRO end point: pain response; FACT-P response
	DOCw with PDN	Measure: FACT-P
	MXN with PDN	No difference in scores of FACT-P domains other than urinary symptoms
SWOG 9916[32]	DOC with ESM	PRO end point: pain response; EORTC-QLQ-C30/PR25 response
	MXN with PDN	Measure: EORTC-QLQ-C30 Fatigue scores worsened in the DOC with ESM arm, and a transitory benefit was reported in the MXN with PDN arm. At therapy end, fatigue was more pronounced in the DOC with ESM arm; after 1 year the same levels of fatigue were registered in both arms
COU-AA-301[5,27]	ABI with PDN	PRO end point: pain response; HRQoL scores improvement
	Placebo with PDN	Measure: FACT-P Exploratory analysis of fatigue measured according to BFI, FACT-P data have not yet published
AFFIRM[7]	ENZ	PRO end point: HRQoL score improvement
	Placebo	Measure: FACT-P HRQoL response evaluated according to a 10-point improvement of FACT-P score has been reported in 43.3% versus 17.8%. No other analysis of domains or fatigue-related items of FACT-P has been reported

ABI, abiraterone acetate; BEV, bevacizumab; BFI, Brief Fatigue Inventory; C30, core questionnaire; DOC, docetaxel; EORTC-QLQ European Organisation For Research And Treatment Of Cancer quality of life questionnaire; ESM, estramustine; FACT-P, Functional Assessment of Cancer Therapy – Prostate; HRQoL, health-related quality of life; mCRPC, metastatic castration resistant prostate cancer; MXN, mitoxantrone; PDN, prednisone; PR25, prostate cancer-specific module; PRO, patient-reported outcomes.

Colloca G. et al. *Clin Genitour Cancer* 2016;14:5-11.

Possible correlates of physical dimension of fatigue in metastatic prostate cancer

Fatigue should be evaluated multi-dimensionally in order to prevent as much as possible those symptoms which impact on quality of life[1]

Possible correlates of fatigue in mHSPC[2]

Correlate
Cancer-related
Albumin
Anaemia
Emesis
Loss of appetite
Pain
PSA
Skeletal-related event
Tumour burden
Patient-related
Anaemia
Depression
Liver dysfunction
Physical function
Renal dysfunction
Treatment-related
Anaemia
Chemotherapy
Hormonal therapy
Radiotherapy

Table adapted from Colloca G., et al. 2016.[2]
PSA, prostate-specific antigen.
1. Speaker opinion; 2. Colloca G. et al. *Clin Genitour Cancer* 2016;14:5-11.
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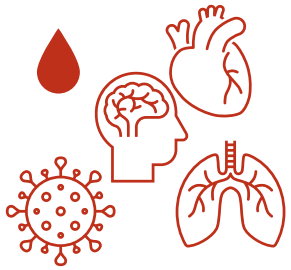
About fatigue in prostate cancer

Potential baseline assessments

Patient history and treatment

- Age and lifestyle (exercise)
- Cancer-related fatigue
- Cancer treatment-related fatigue
  - Prior or current radiotherapy
  - Chemotherapy
  - Time on ADT therapy (sarcopenia, adiposity, impaired cognitive function and consequent fall risk)



Comorbidities and comedications

- Comorbid conditions
- Comedication:
  - ➢ AEs that include fatigue-related conditions
  - ➢ Potential DDIs that exacerbate fatigue-related AEs

Clinical assessment of other potential causes of fatigue

- Depression
- Insomnia (anxiety)

ADT, androgen-deprivation therapy; AEs, adverse events; DDI, drug-drug interaction;
Speaker experience.

Clinical case: Mr D

72-year-old male

- Routine lab PSA: 54 ng/ml
- DRE: bilateral hard induration with extension beyond the capsula and seminal vesicle involvement (cT3b)
- **Medical history:**
  BMI: 29 kg/m^2
  HTN controlled by CNI
  Myocardial infarction (2014)
  Placement of two stents

Doublet therapy

- Initiation of LHRH antagonist (degarelix) plus enzalutamide

Tolerability after 12 months

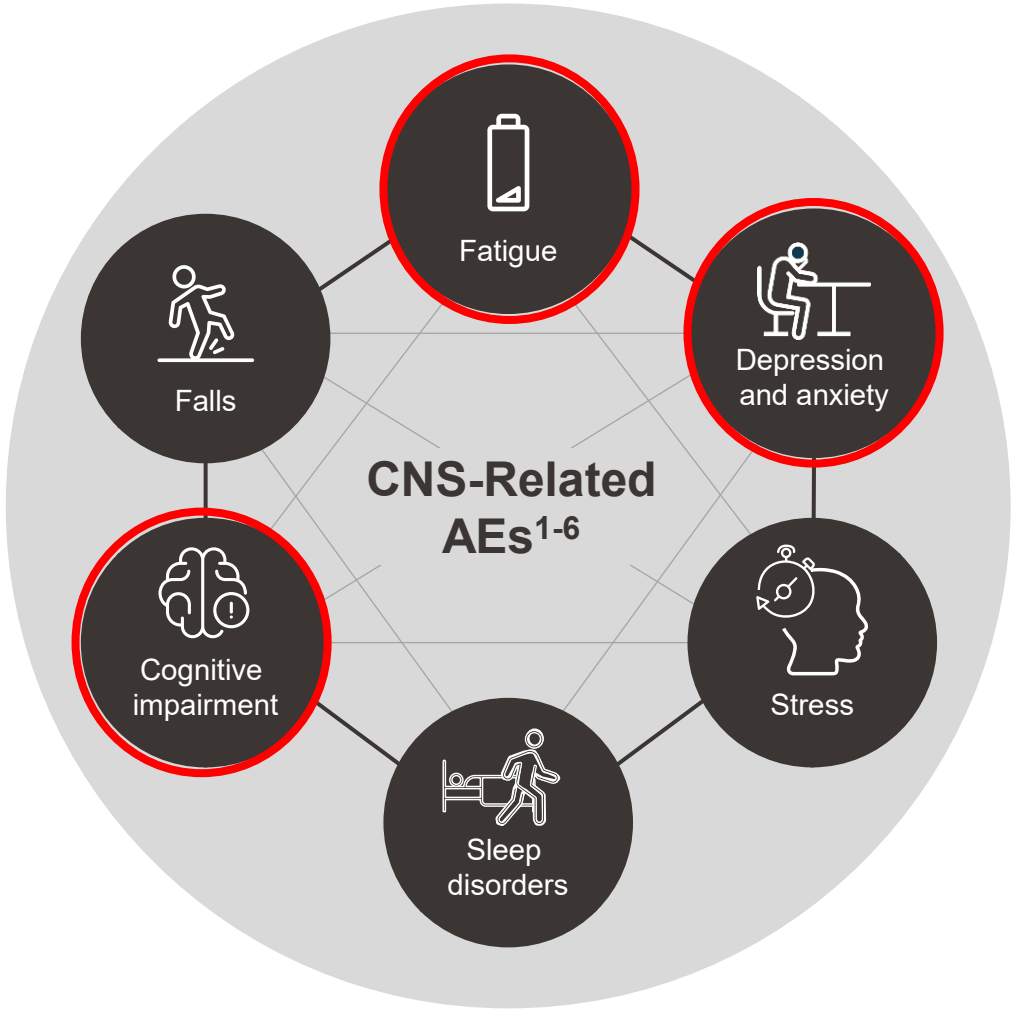
- Good blood pressure
- Asthenia grade 2
- Cognitive dysfunction and depression

Efficacy after 12 months

- No urinary or painful symptoms
- PSA: 0.2 ng/ml

Fictitious patient case provided by the speaker. Patient image available from Microsoft PowerPoint.
BMI, body mass index; CNI, calcineurin inhibitor; HTN, hypertension; LHRH, luteinising hormone-releasing hormone; mHSPC, metastatic hormone-sensitive prostate cancer; PCa, prostate cancer; PSA, prostate-specific antigen.

CNS changes can significantly impact QOL and are frequently underdiagnosed in patients with prostate cancer



CNS AEs may influence QOL by[1,2]:

- Impacting patients' ability to understand and participate in the treatment decision-making process
- Making it harder to perform day-to-day tasks, such as shopping, preparing food, managing bills, or look after themselves
- Impacting relationships with family and friends
- Impairing patients' ability to keep up with medicines

For many patients with prostate cancer **maintaining QOL is a key goal** when choosing a therapeutic option[1-4]

AE, adverse event; CNS, central nervous system; QOL, quality of life.

1. Morgans AK, et al. *Clin Genitourin Cancer.* 2021;19(5):e467. 2. Wefel J, et al. *CNS Drugs.* 2022;36:419-449. 3. Nowakowska MK, et al. *JAMA Oncol*. 2023;9(7):930-937. 4. Huang S, et al. *Clin Transl Sci*. 2022;16:313-325. 5. De Sousa A, et al. *Prostate Cancer Prostatic Dis*. 2012;15:120-127. 6. Reiss AB, et al. *Medicina (Kaunas).* 2024;60:77.

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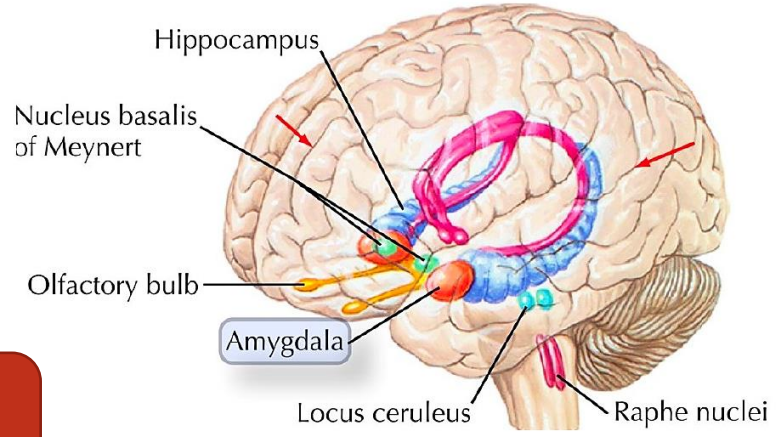
Cognitive impairment with ADT: The role of testosterone



BRAIN

- Testosterone
  - Androgen receptors (AR)
  - Learning and memory
  - Prevention of cognitive decline

MOOD

- Testosterone
  - EMOTIONS

Image provided by the speaker.
ADT, androgen deprivation therapy.
Reiss AB, et al. *Medicina (Kaunas)*.2024;60:77.

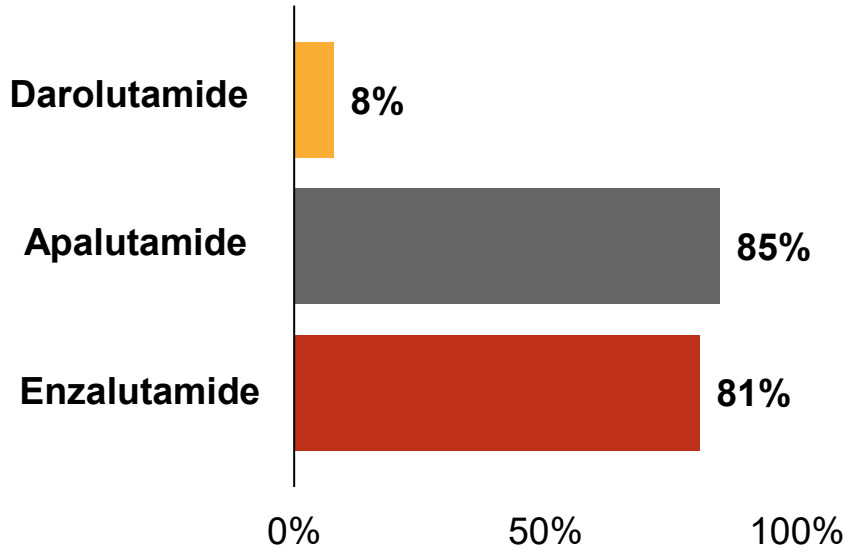
Neurological impacts of ARPIs: Fatigue

- Brain/blood ratios of enzalutamide and apalutamide were 10 times higher than darolutamide in preclinical models

NB: The dosing in this study was 10 mg/kg for each ARPI, and does not reflect differences in the approved dose for use of these medicines in patients*

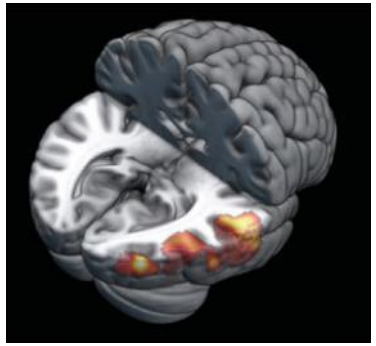
- Phase 1 neuroimaging study in healthy volunteers supports preclinical evidence of low blood-brain barrier penetration with darolutamide

Ratio of brain/blood concentration[1]

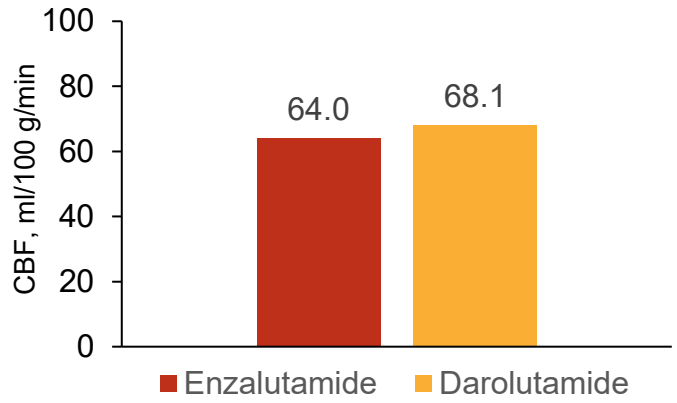


Regional CBF changes in grey matter[2]

ENZA vs DARO†



5.9% reduction



- Significant 5.9% localised reduction in CBF for enzalutamide versus darolutamide (FWE corrected p<0.05)

Figures adapted from the respective references.[1,2]
*Approved doses are as follows: 160 mg OD for enzalutamide; 240 mg OD for apalutamide; 600 mg BID for darolutamide.
†Coloured areas indicate the level of difference between MRI signals with one test drug versus the other. These images are statistical maps derived from all subjects overlaid on an anatomical image.
ARPI, androgen receptor pathway inhibitor; CBF, cerebral blood flow; DARO, darolutamide; ENZA, enzalutamide; FWE, family-wise error rate; MRI, magnetic resonance imaging.
1. Zurth C, et al. *J Clin Oncol*. 2019;37(suppl 7):156; 2. Williams S, et al. *Target Oncol*. 2023;18:403-413.

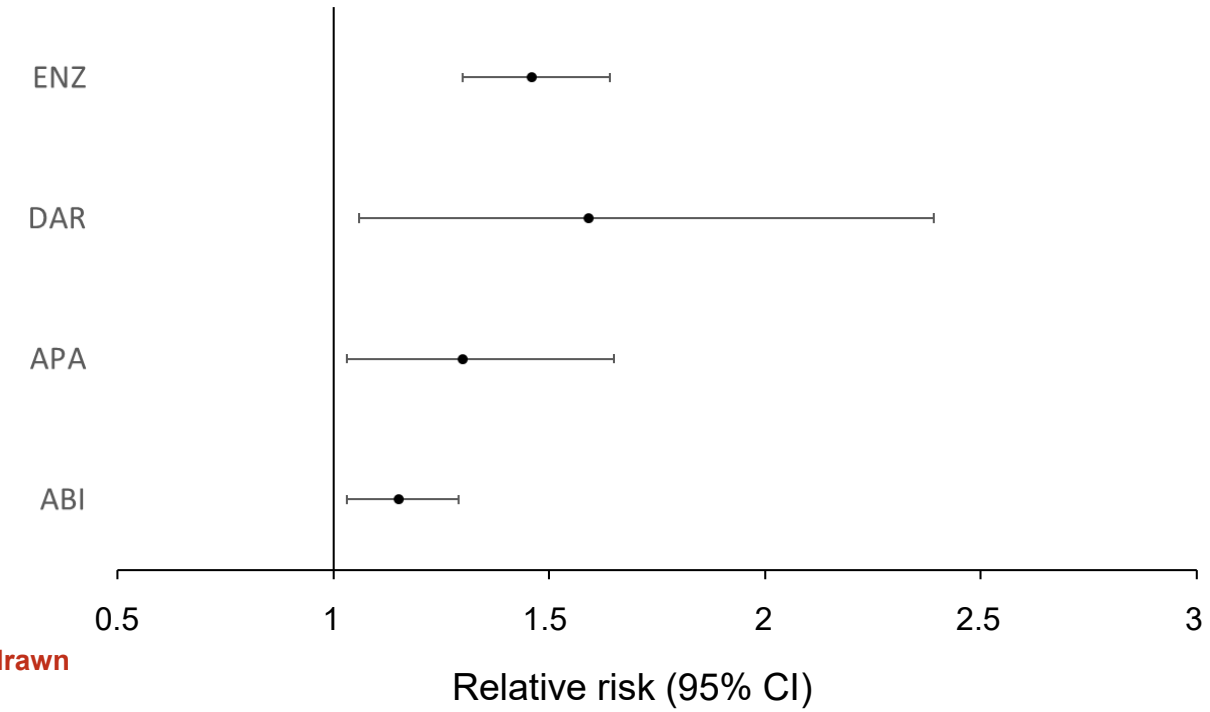
Neurological impacts of ARPIs: Fatigue

Rates of any-grade fatigue in Phase 3 trials of the ARPIs (as doublet therapy)[1-4]

Trial	ARPI	Median treatment duration/Time to follow-up, months	ARPI + ADT arm, %	Control arm, %
TITAN (primary analysis)[1]	Apalutamide	22.7	19.7	16.7
ARCHES (primary analysis)[2]	Enzalutamide	12.8 (ENZ) 11.6 (PBO)	19.6	15.3
ARANOTE (primary analysis)[3]	Darolutamide	25.3 (DAR) 25.0 (PBO)	5.6	8.1
LATITUDE (interim analysis)[4]	Abiraterone	30.4	13	14

Data shown are for illustrative purposes only, and direct comparisons should not be drawn

NMA of fatigue events with ARPIs[5]



- Fatigue: Can interfere with cognitive function[6]
  - Enzalutamide and apalutamide may induce fatigue due to their higher ability to pass the blood-brain barrier[7,8]
  - Darolutamide does not significantly alter cerebral blood flow, consistent with its low blood–brain barrier penetration and low risk of CNS-related AEs[9]

Figure adapted from Matsukawa et al., 2025.[5]
ABI, abiraterone; AEs, adverse events; APA, apalutamide; ARPIs, androgen receptor pathway inhibitors; CNS, central nervous system; DAR, darolutamide; ENZ, enzalutamide.
1. Chi KN, et al. *N Engl J Med* 2019;381:13–24; 2. Amstrong A, et al. *J Clin Oncol* 2022 40:1616–1622; 3. Saad F, et al. J Clin Oncol 2024;42:4271–4281; 4. Fizazi K, et al. *N Engl J Med* 2017;377:352–360;
5. Matsukawa A, et al. *Clin Genitour Cancer* 2025;23:102251; 6. Ryan C et al. *Prostate Cancer Prostatic Dis* 2020;23:207–219; 7. Huang S-W et al. *Clin Transl Sci* 2023;16:313–325;
8. Turco F et al. *Prostate Cancer Prostatic Dis* 2024;27:385–392; 9. Williams SCR et al. *Target Oncol* 2023;18:403–413.
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CNS events associated with ARPIs in a network meta-analysis

		Neuropsychiatric Symptoms				Physical Symptoms					
		Mental Impairment Disorder		Cognitive Impairment		Seizure		Fatigue		Fall	
		Any Grade	Grade ≥3	Any Grade	Grade ≥3	Any Grade	Grade ≥3	Any Grade	Grade ≥3	Any Grade	Grade ≥3
Data Summary of Included Studies		4 Studies 4 Comparisons 5819 Patients	4 Studies 4 Comparisons 5819 Patients	8 Studies 8 Comparisons 8969 Patients	8 Studies 8 Comparisons 8773 Patients	14 Studies 14 Comparisons 13732 Patients	13 Studies 13 Comparisons 13,164 Patients	24 Studies 24 Comparisons 19,544 Patients	21 Studies 21 Comparisons 18,228 Patients	13 Studies 13 Comparisons 13,353 Patients	14 Studies 14 Comparisons 14,694 Patients
SOC	RR (95% CI)	Ref.	Ref.	Ref.	Ref.	Ref.	Ref.	Ref.	Ref.	Ref.	Ref.
	SUCRA value	84%	54%	91%	69%	78%	65%	99%	73%	88%	85%
Abi	RR (95% CI)	N/A	N/A	1.80 (1.29-2.52)	1.89 (0.57-6.35)	1.82 (0.61-5.47)	1.60 (0.31-8.25)	1.15 (1.03-1.29)	1.22 (0.79-1.87)	2.72 (1.10-6.72)	2.30 (0.56-9.39)
	SUCRA value			51%	30%	44%	42%	69%	51%	17%	34%
Apa	RR (95% CI)	1.69 (0.88-3.26)	0.50 (0.01-25.06)	N/A	N/A	1.62 (0.34-7.63)	1.11 (0.08-14.41)	1.30 (1.03-1.65)	3.15 (0.48-20.87)	1.54 (1.03-2.31)	1.77 (0.76-4.13)
	SUCRA value	36%	68%			53%	54%	45%	15%	51%	45%
Dar	Rr (95% CI)	1.10 (0.51-2.39)	3.49 (0.17-69.81)	2.32 (0.26-20.83)	0.58 (0.01-29.33)	1.16 (0.11-12.84)	0.58 (0.01-29.30)	1.59 (1.06-2.39)	0.46 (1.10-2.14)	1.08 (0.57-2.02)	1.31 (0.40-4.26)
	SUCRA value	71%	23%	41%	70%	60%	68%	15%	89%	80%	62%
Enz	RR (95% CI)	2.58 (1.27-5.24)	0.99 (0.08-12.87)	2.74 (1.98-3.78)	1.92 (0.48-7.69)	3.42 (1.26-9.27)	2.81 (0.70-11.24)	1.46 (1.30-1.64)	1.75 (1.18-2.58)	2.61 (2.02-3.37)	2.44 (1.46-4.07)
	SUCRA value	8%	55%	16%	31%	15%	21%	22%	23%	13%	23%
Ranking		ADT>Dar >Apa>Enz	Apa>Enz >SOC>Dar	ADT>Abi >Enz	Dar>SOC >Enz>Abi	ADT>Dar> Apa>Abi>Enz	Dar>ADT> Apa>Abi>Enz	ADT>Abi> Apa>Enz>Dar	Dar>ADT>Abi >Enz>Apa	ADT>Dar> Apa>Abi>Enz	ADT>Dar> Apa>Abi>Enz

ARPIs ↗ various CNS events in patients with prostate cancer

Table adapted from Matsukawa et al., 2025.
Abi, abiraterone acetate; Apa, apalutamide; ARPI, androgen receptor pathway inhibitor; CI, confidence interval; CNS, central nervous system; Dar, darolutamide; Enz, enzalutamide; N/A, not applicable; RR, relative risk; SOC, standard of care.
Matsukawa A. et al. *Clin Genitour Cancer* 2025;23:102251.
MAT-NL-XTD-2025-00037 | July 2025

Clinical case: Mr D

72-year-old male

- Routine lab PSA: 54 ng/ml
- DRE: bilateral hard induration with extension beyond the capsula and seminal vesicle involvement (cT3b)
- **Medical history:**
  BMI: 29 kg/m^2
  HTN controlled by CNI
  Myocardial infarction (2014)
  Placement of two stents

Doublet therapy

- Initiation of LHRH antagonist (degarelix) plus enzalutamide

Efficacy after 12 months

- No urinary and painful symptoms
- PSA: 0.2 ng/ml

Tolerability after 12 months

- Good blood pressure
- Asthenia grade 2
- Cognitive dysfunction and depression

Efficacy after 18 months

- Due to hypercholesterolemia: simvastatin*
- PSA: 0.1 ng/ml

Fictitious patient case provided by the speaker. Patient image available from Microsoft PowerPoint.
*Please consult the XTANDI (enzalutamide) Summary of Product Characteristics before prescribing statis that are metabolised by CYP3A4 due to potential drug-drug interactions.
BMI, body mass index; CNI, calcineurin inhibitor; HTN, hypertension; LHRH, luteinising hormone-releasing hormone; mHSPC, metastatic hormone-sensitive prostate cancer; PCa, prostate cancer; PSA, prostate-specific antigen.

Hormone therapy (ADT + ARPI): Cardiovascular toxicities[1-3]

Metabolic effects:

- ↑ LDL and triglycerides
- ↑ fatty mass
- ↑ insulin resistance
- ↑ arterial stiffness
- ↓ lean mass

Conclusion:

Metabolic alteration and atheroma

Cardiovascular risk

- Myocardial infarction
- Coronary heart disease
- Stroke
- Deep Vein Thrombosis
- High blood pressure
- Atrial fibrillation
- QT prolongation
- Sudden death

ADT, androgen deprivation therapy; ARPI, androgen receptor pathway inhibitor; LDL, low density lipoprotein.

1. Fradin J, et al. *Cancers (Basel)* 2023;15:2316; 2. Chen K, et al. *Front Oncol* 2024;14:1386597; 3. Matsukawa A, et al. *Clin Genitour Cancer* 2024;23:102251.

Clinical case: Mr D

72-year-old male

- Routine lab PSA: 54 ng/ml
- DRE: bilateral hard induration with extension beyond the capsula and seminal vesicle involvement (cT3b)
- **Medical history:**
  BMI: 29 kg/m^2
  HTN controlled by CNI
  Myocardial infarction (2014)
  Placement of two stents

Doublet therapy

- Initiation of LH-RH antagonist (degarelix) plus enzalutamide

Efficacy after 12 months

- No urinary and painful symptoms
- PSA: 0.2 ng/ml

Tolerability after 12 months

- Good blood pressure
- Asthenia grade 2
- Cognitive dysfunction and depression

Efficacy after 24 months

- Loss of muscle mass
- PSA: 0.1 ng/ml

Fictitious patient case provided by the speaker. Patient image available from Microsoft PowerPoint.
BMI, body mass index; CNI, calcineurin inhibitor; HTN, hypertension; LHRH, luteinising hormone-releasing hormone; mHSPC, metastatic hormone-sensitive prostate cancer; N, normal; PCa, prostate cancer; PSA, prostate-specific antigen.

The vicious circle of a sedentary lifestyle[1,2]

Altered body composition

- ↓ Physical abilities
- ↓ Cardiorespiratory capacities
- ↓ Muscular strength
- ↑ Asthenia

- Loss of self-esteem
- Cognitive disorders
- **Sarcopenia**
- **Denutrition**
- ↑ Anxiety / ↑ Depression

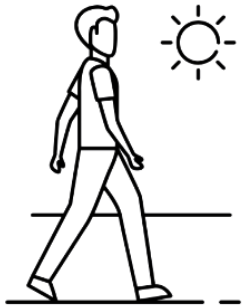
50 to 80% of adult cancer patients suffer from cachexia

1. Argilés J. et al. *Nat Rev Cancer* 2014;14:754–762; 2. Speaker experience.

Regular physical activity during ADT treatment

Exercise is recommended by European guidelines for the management of fatigue and other ADT-related toxicities.[1,2]

- **Regular physical activity[1]**
  - 30 minutes per day of walking
  - Muscle strengthening exercises (high and low) 2 times/week
  - Limit sedentary time
- **± Adapted Physical Activity (APA) or physiotherapy[1]**



1. Ploussard G, et al. *Fr J Urol* 2024;34:102717; 2. Cornford et al. EAU guidelines on prostate cancer 2025. Available at: https://uroweb.org/guidelines/prostate-cancer. Last accessed: June 2025.

ArtemisPRO: apalutamide vs. enzalutamide doublet in real life

Prospective, Multi-Country, Observational Study of Clinical Outcomes for Patients With Metastatic Hormone Sensitive Prostate Cancer Treated With ADT plus Apalutamide or Enzalutamide Under Routine Clinical Practice

Patients:

- **Patients with mHSPC** who are starting apalutamide + ADT or enzalutamide + ADT as per investigator discretion and per routine practice
- N=**450 patients**

Apalutamide + ADT

Enzalutamide + ADT

Objectives:

PSA Efficacy:
- **Undetectable PSA (<0.2 ng/ml) at Month 3**

PROs/ QOL:
- HRQoL: EORTC QLQ-C30
- Cognitive function: FACT-Cog
- Fatigue: BFI-SF
- Anxiety: MAX-PC

ADT, androgen deprivation therapy; BFI-SF, Brief Fatigue Inventory – Short Form; DOC, docetaxel; EORTC-QLQ-C30, European Organisation For Research And Treatment Of Cancer quality of life questionnaire, core questions; FACT-Cog, Functional Assessment of Cancer Therapy – Cognition; HRQoL, health-related quality of life; MAX-PC, Memorial anxiety scale for prostate cancer; mHSPC, metastatic hormone-sensitive prostate cancer; PRO, patient-reported outcomes; PSA, prostate-specific antigen; QoL, quality of life; TEAE, treatment-emergent adverse event.

NCT05901649 . Available at: https://clinicaltrials.gov/study/NCT05901649. Last accessed: June 2025.

Follow-up of prostate cancer patients by two referrers: the doctor and the advanced practice nurse (APN) in daily practice

- 2 referrers/care pathway
- Inform/support the patient => actor in their care
- Therapeutic education
- Prevent/screen geriatric syndromes
- Detect adverse events early
- Improve compliance and prevent asthenia or fatigue by adapted treatment
- Optimise city-hospital coordination in order to avoid disruption of health care
- Patient/carer support (supportive oncological care, patient partner, associations, etc.)
- => ↗ state of health + functional state/autonomy + quality of life + patient/caregiver satisfaction

Speaker's opinion/experience.

Take-home messages on fatigue in mHSPC

- Fatigue is a frequent event in prostate cancer
- Fatigue needs to be evaluated frequently
- There are many causes of fatigue related to cancer, patient or treatment
- Treat as soon as possible toxicities due to ADT + ARPI ± chemotherapy
- Optimisation of the care pathway/monitoring around the medication:
  - Select the right drug for the right patient (comorbidities, interactions)
  - Screen/prevent side effects: Improve quality/quantity of life

ADT, androgen deprivation therapy; ARPI, androgen receptor pathway inhibitor; mHSPC, metastatic hormone-sensitive prostate cancer.
Speaker's opinion/experience.
MAT-NL-XTD-2025-00037 | July 2025

Thanks to

HEGP uro-oncol
Stéphane Oudard
Yann-Alexandre Vano
Constance Thibault
Claire Gervais
Edoaurd Auclin
Arnaud Méjean
Marc Olivier Timsit
Charles Darianne
Francois Audenet
Laure Fournier

ARTIC
Salma Kotti
Houda Belhadj
Sara Sahli
Mohammed Sqalli-Houssaini
José Balcacérès

INSERM1138 Team
Catherine Fridman
Hervé Fridman
Chen-Ming Sun
Guillaume Lacroix
Laetitia Lacroix
Meylan Maxime

INSERM U970 team
Eric Tartour
Magali Terme
Alain Gey

ASSISTANCE PUBLIQUE HÔPITAUX DE PARIS

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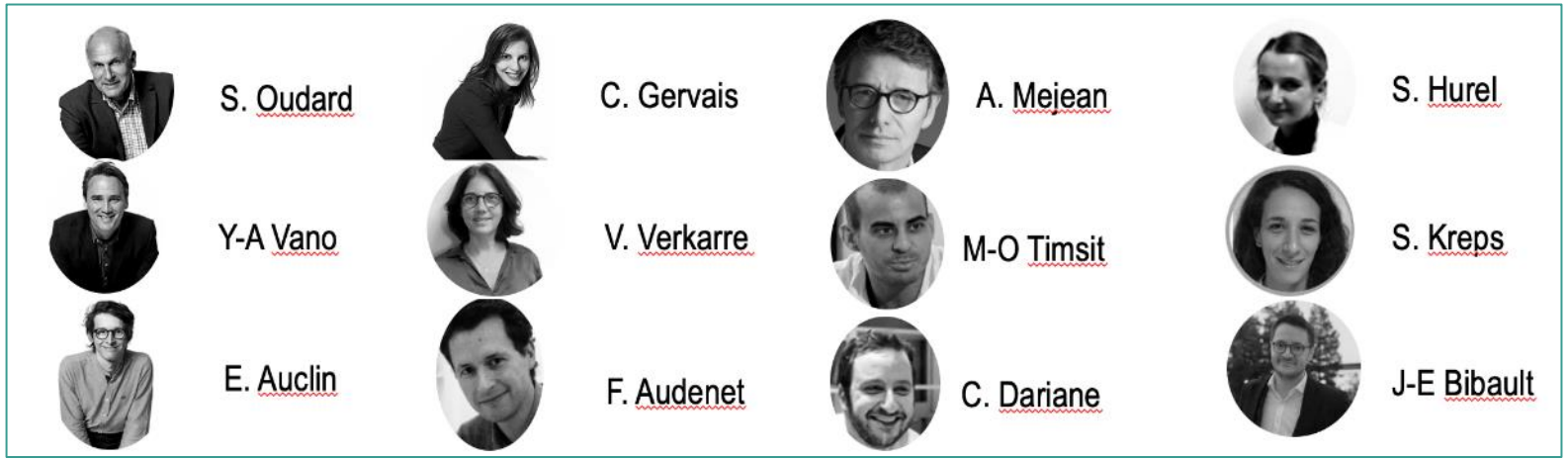
Aurélien de Reyniès
Sylvie Job



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Hôpital européen Georges-Pompidou

Inserm
Institut national de la santé et de la recherche médicale

Images provided by the speaker.

Genitourinary Masterclass

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Please refer to the EMA SmPC for XTANDI™ (enzalutamide) via the following link: https://www.ema.europa.eu/en/documents/product-information/xtandi-epar-product-information_en.pdf

Scan/click here for the XTANDI™ UK prescribing information

Scan/click here for the XTANDI™ NL SmPC

XTANDI™ is subject to medicinal prescription.
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EMA, European Medicines Agency; SmPC, Summary of Product Characteristics.
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